

## Pantheon Report

Generated at 2018-02-27 10:41:27 (UTC).

Tested in mahimahi: mm-delay 10 mm-link 12mbps.trace 12mbps.trace  
--uplink-queue=droptail --uplink-queue-args=packets=1 --downlink-queue=droptail  
--downlink-queue-args=packets=1

Repeated the test of 17 congestion control schemes 10 times.

Each test lasted for 30 seconds running 1 flow.

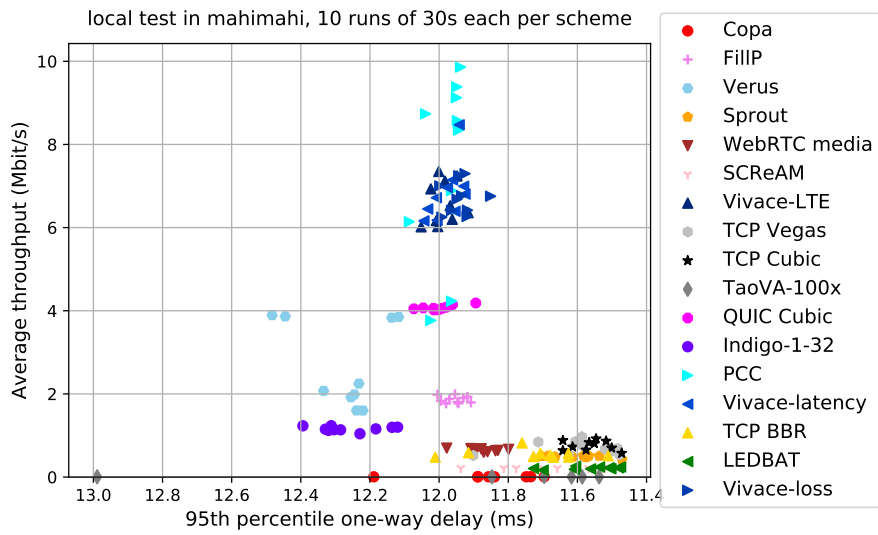
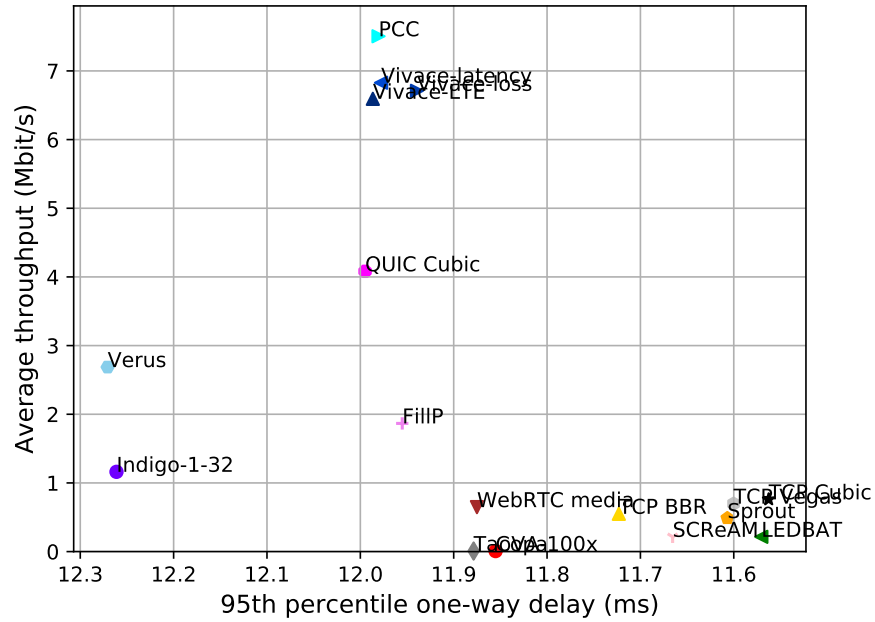
Increased UDP receive buffer to 16 MB (default) and 32 MB (max).

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

Git summary:

```
branch: master @ f12c42a2c63fdd9a862eefa0468859bf379b6623
third_party/calibrated_koho @ 3cb73c0d1c0322cdfae446ea37a522e53227db50
  M datagrump/sender.cc
third_party/fillp @ 828bbf95fd4941149b5cec90f281d1c69ae1a5c6
third_party/genericCC @ 9249eea3238475c4d8cca1443d28df70bff6c4a2
third_party/indigo @ a9b2060d39e4da2e8987e893e3eca2a6c7cd0ab9
third_party/indigo-1-layer-128-unit @ 3ae9e4ef4230db7484501f82ce8b377695f2f66d
third_party/indigo-1-layer-32-unit @ 2601c92e4aa9d58d38dc4dfe0ecdbf90c077e64d
third_party/indigo-1-layer-32-unit-no-calib @ 1f3a7f75b41135ed5b540c0fd3505939528e2a5f
third_party/indigo-no-calib @ 7224f2202e8a044d8306fa0b983ad84360c53d89
third_party/koho_cc @ f0f2e693303aee82ea808e6928eac4f1083a6681
  M datagrump/sender.cc
third_party/libutp @ b3465b942e2826f2b179eaab4a906ce6bb7cf3cf
third_party/pantheon-tunnel @ fb1053193c2861da659ba9013db26744ccfcf993
third_party/pcc @ 1afc958fa0d66d18b623c091a55fec872b4981e1
  M receiver/src/buffer.h
  M receiver/src/core.cpp
  M sender/src/buffer.h
  M sender/src/core.cpp
third_party/proto-quic @ 77961f1a82733a86b42f1bc8143ebc978f3cff42
third_party/scream @ c3370fd7bd17265a79aeb34e4016ad23f5965885
third_party/sourdough @ f1a14bffe749737437f61b1eaeeb30b267cde681
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/vivace @ 7a4ba531e75b4a6f66f5c4580192120401784ce3
third_party/webrtc @ a488197ddd041ace68a42849b2540ad834825f42
```

local test in mahimahi, 10 runs of 30s each per scheme  
(mean of all runs by scheme)



scheme	# runs	mean avg tput (Mbit/s)	mean 95th-%ile delay (ms)	mean loss rate (%)
		flow 1	flow 1	flow 1
TCP BBR	10	0.55	11.72	28.51
TCP Cubic	10	0.76	11.56	19.55
LEDBAT	10	0.22	11.57	49.36
PCC	10	7.50	11.98	3.48
QUIC Cubic	10	4.08	11.99	8.22
SCReAM	10	0.21	11.67	0.03
WebRTC media	10	0.65	11.88	37.06
Sprout	10	0.49	11.61	8.12
TaoVA-100x	6	0.01	11.88	55.78
TCP Vegas	10	0.70	11.60	19.26
Verus	10	2.69	12.27	98.27
Copa	8	0.01	11.86	94.63
FillP	10	1.87	11.96	77.63
Indigo-1-32	10	1.16	12.26	95.28
Vivace-latency	10	6.83	11.98	0.82
Vivace-loss	10	6.71	11.94	0.23
Vivace-LTE	10	6.59	11.99	0.18

Run 1: Statistics of TCP BBR

Start at: 2018-02-27 09:00:44

End at: 2018-02-27 09:01:14

# Below is generated by plot.py at 2018-02-27 10:36:30

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.57 Mbit/s (4.7% utilization)

95th percentile per-packet one-way delay: 11.707 ms

Loss rate: 27.11%

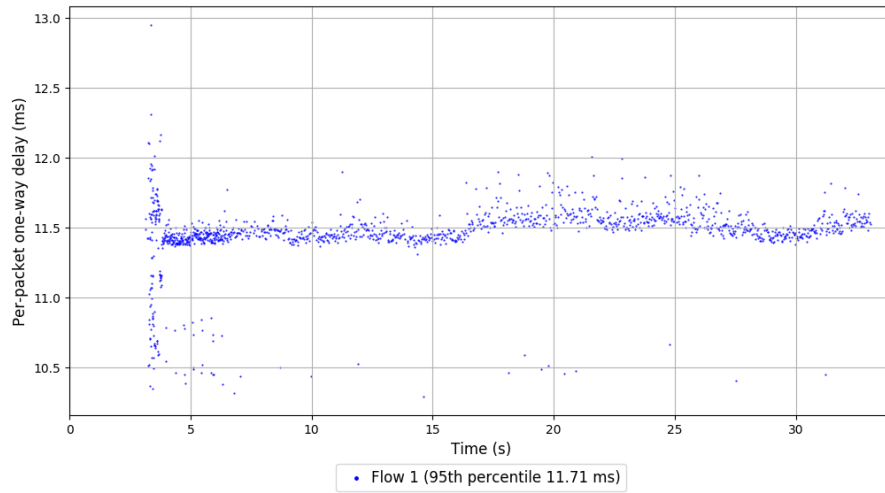
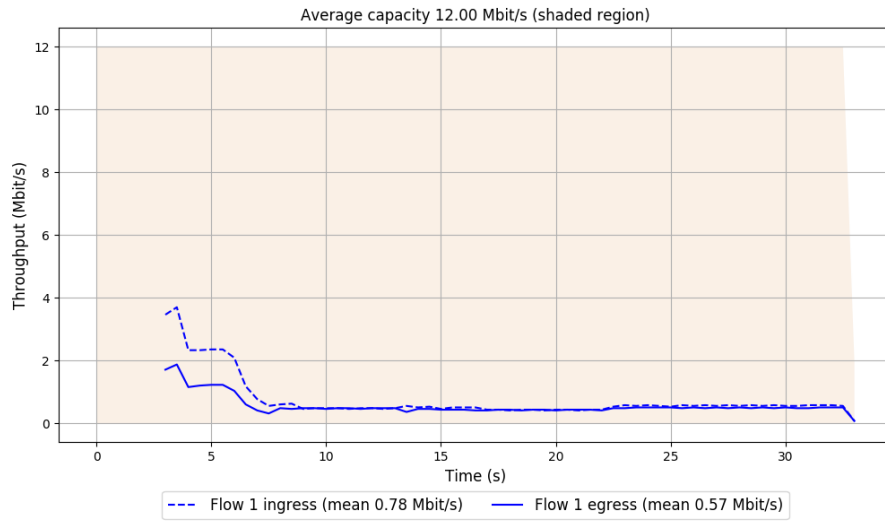
-- Flow 1:

Average throughput: 0.57 Mbit/s

95th percentile per-packet one-way delay: 11.707 ms

Loss rate: 27.11%

# Run 1: Report of TCP BBR — Data Link



Run 2: Statistics of TCP BBR

Start at: 2018-02-27 09:10:55

End at: 2018-02-27 09:11:25

# Below is generated by plot.py at 2018-02-27 10:36:30

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.48 Mbit/s (4.0% utilization)

95th percentile per-packet one-way delay: 11.670 ms

Loss rate: 23.52%

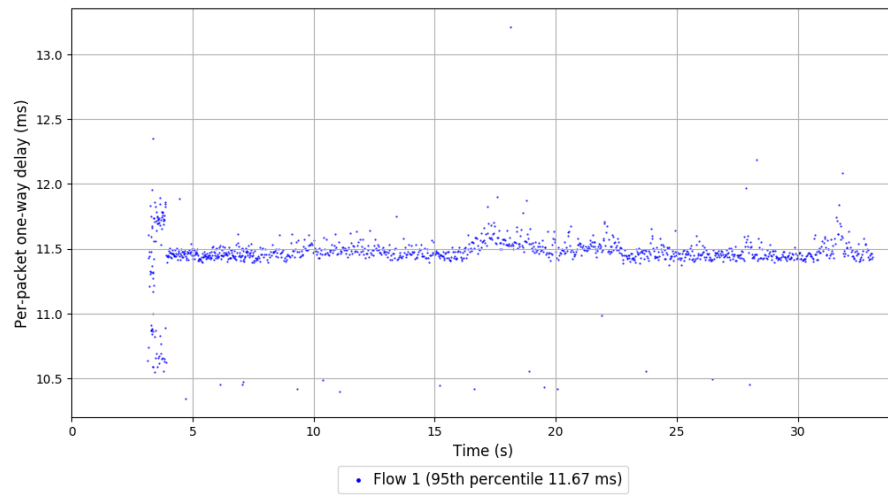
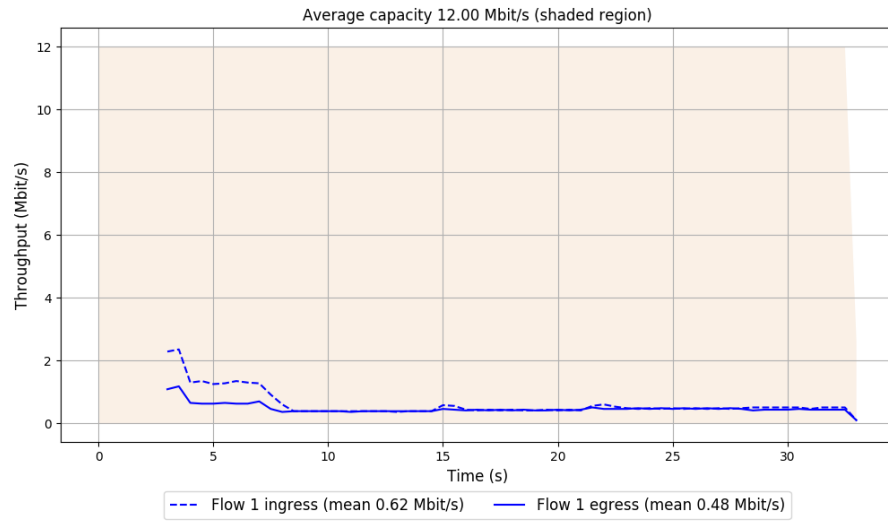
-- Flow 1:

Average throughput: 0.48 Mbit/s

95th percentile per-packet one-way delay: 11.670 ms

Loss rate: 23.52%

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



Run 3: Statistics of TCP BBR

Start at: 2018-02-27 09:21:06

End at: 2018-02-27 09:21:36

# Below is generated by plot.py at 2018-02-27 10:36:30

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.48 Mbit/s (4.0% utilization)

95th percentile per-packet one-way delay: 11.625 ms

Loss rate: 15.48%

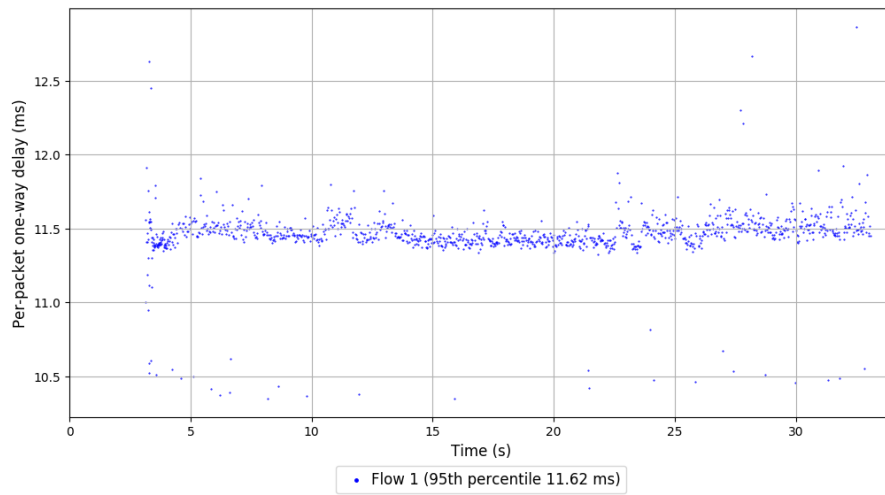
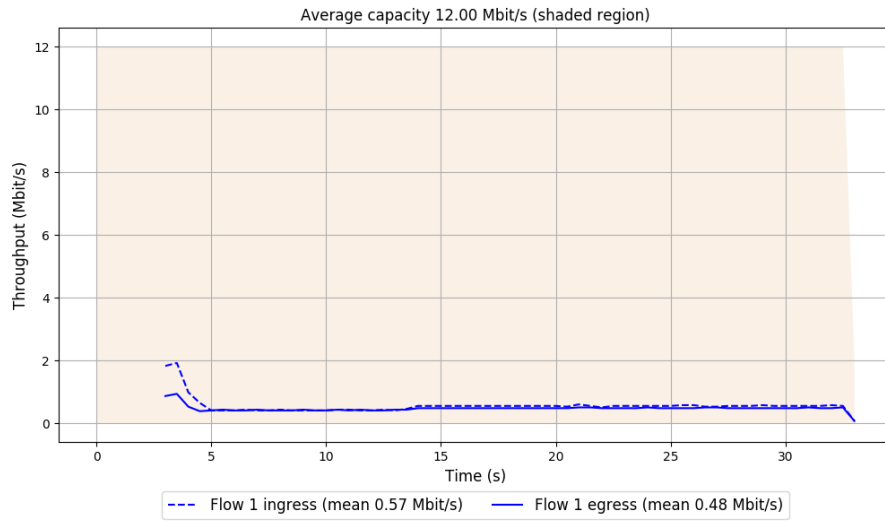
-- Flow 1:

Average throughput: 0.48 Mbit/s

95th percentile per-packet one-way delay: 11.625 ms

Loss rate: 15.48%

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



Run 4: Statistics of TCP BBR

Start at: 2018-02-27 09:31:21

End at: 2018-02-27 09:31:51

# Below is generated by plot.py at 2018-02-27 10:36:30

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.49 Mbit/s (4.1% utilization)

95th percentile per-packet one-way delay: 11.727 ms

Loss rate: 32.03%

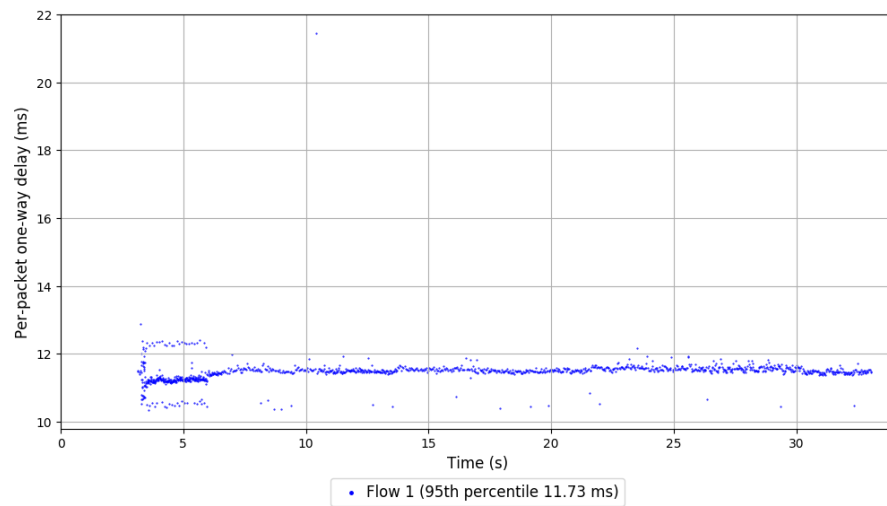
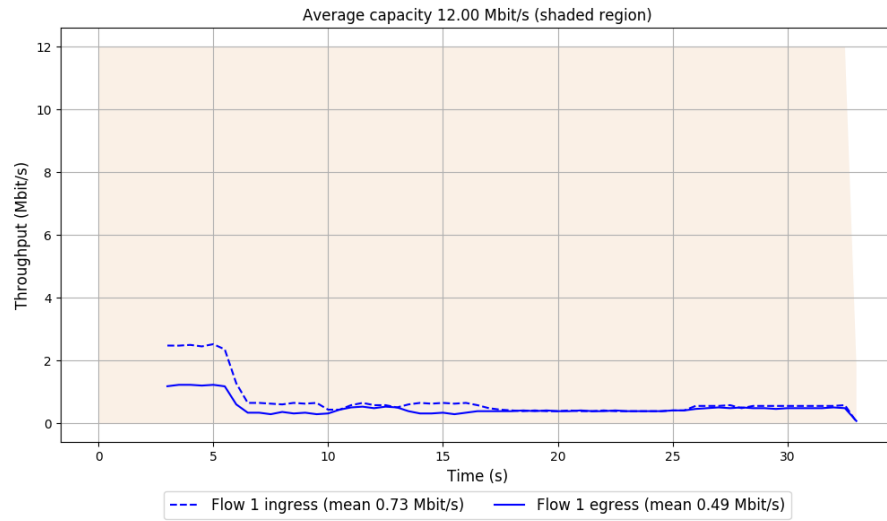
-- Flow 1:

Average throughput: 0.49 Mbit/s

95th percentile per-packet one-way delay: 11.727 ms

Loss rate: 32.03%

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



Run 5: Statistics of TCP BBR

Start at: 2018-02-27 09:41:36

End at: 2018-02-27 09:42:06

# Below is generated by plot.py at 2018-02-27 10:36:30

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.57 Mbit/s (4.7% utilization)

95th percentile per-packet one-way delay: 11.626 ms

Loss rate: 26.63%

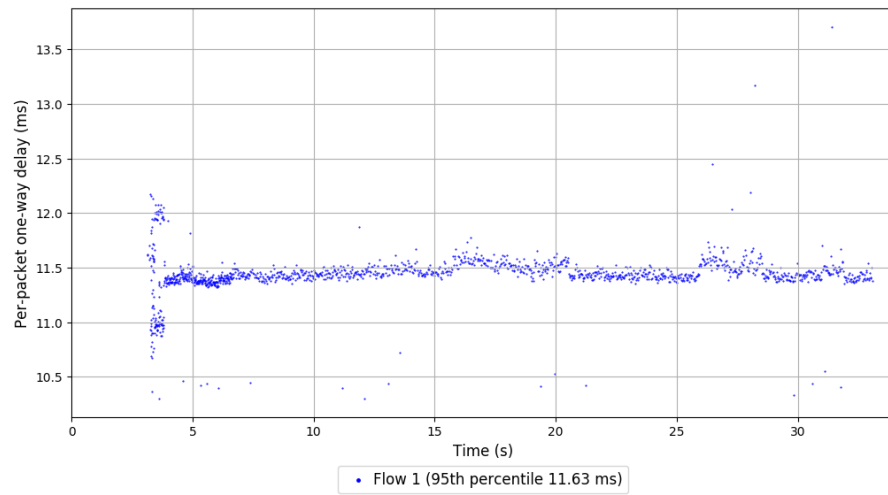
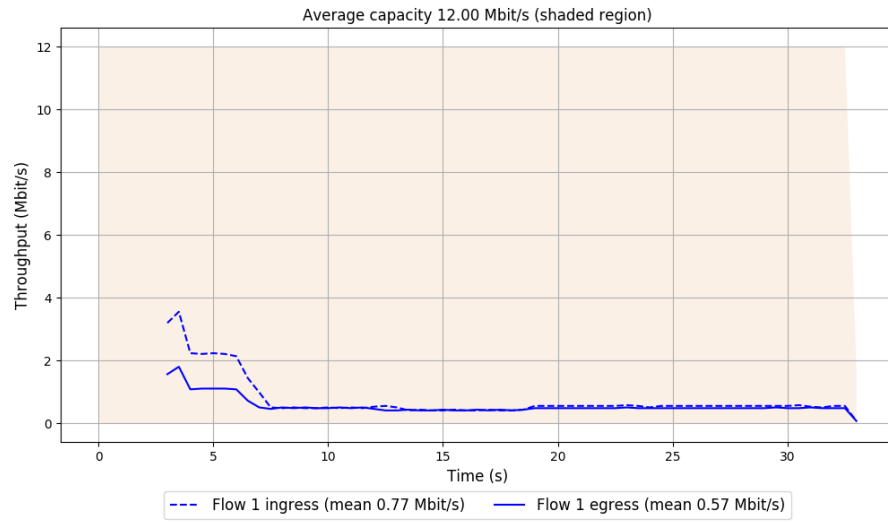
-- Flow 1:

Average throughput: 0.57 Mbit/s

95th percentile per-packet one-way delay: 11.626 ms

Loss rate: 26.63%

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



Run 6: Statistics of TCP BBR

Start at: 2018-02-27 09:51:48

End at: 2018-02-27 09:52:18

# Below is generated by plot.py at 2018-02-27 10:36:30

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.51 Mbit/s (4.3% utilization)

95th percentile per-packet one-way delay: 11.511 ms

Loss rate: 29.57%

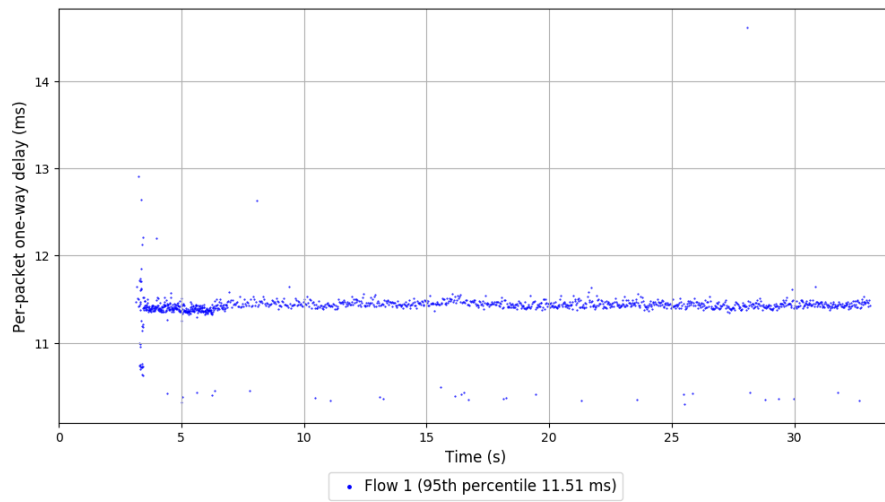
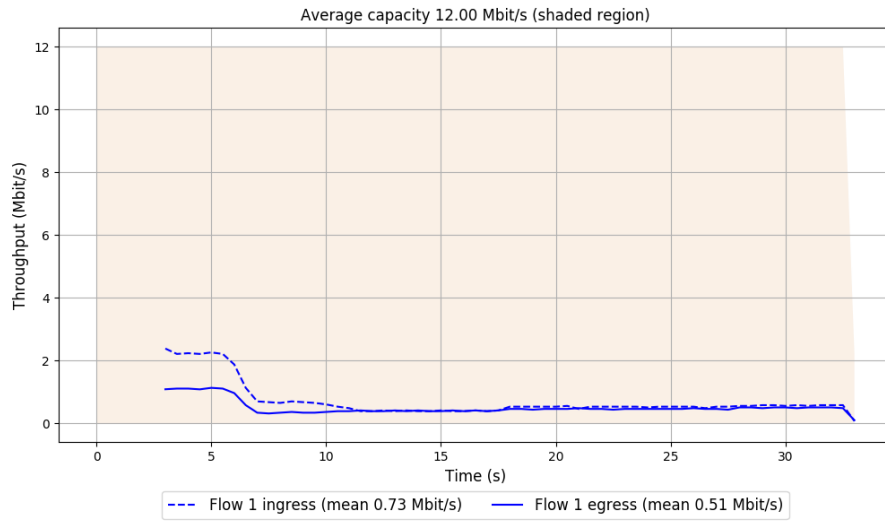
-- Flow 1:

Average throughput: 0.51 Mbit/s

95th percentile per-packet one-way delay: 11.511 ms

Loss rate: 29.57%

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



Run 7: Statistics of TCP BBR

Start at: 2018-02-27 10:01:59

End at: 2018-02-27 10:02:29

# Below is generated by plot.py at 2018-02-27 10:36:31

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.82 Mbit/s (6.8% utilization)

95th percentile per-packet one-way delay: 11.760 ms

Loss rate: 39.11%

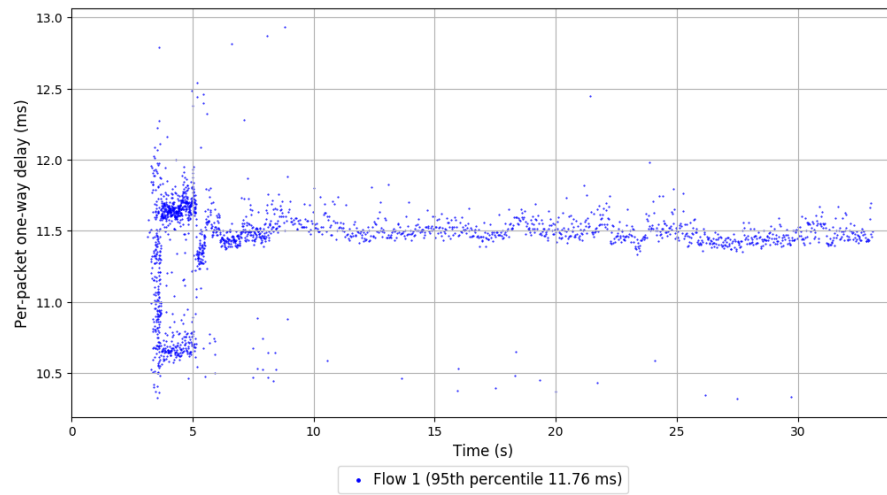
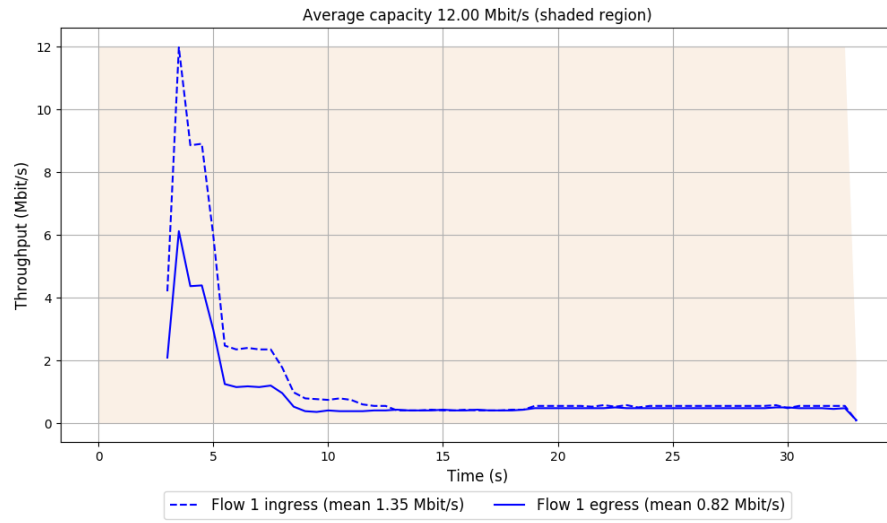
-- Flow 1:

Average throughput: 0.82 Mbit/s

95th percentile per-packet one-way delay: 11.760 ms

Loss rate: 39.11%

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



Run 8: Statistics of TCP BBR

Start at: 2018-02-27 10:12:10

End at: 2018-02-27 10:12:40

# Below is generated by plot.py at 2018-02-27 10:36:31

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.52 Mbit/s (4.3% utilization)

95th percentile per-packet one-way delay: 11.679 ms

Loss rate: 26.19%

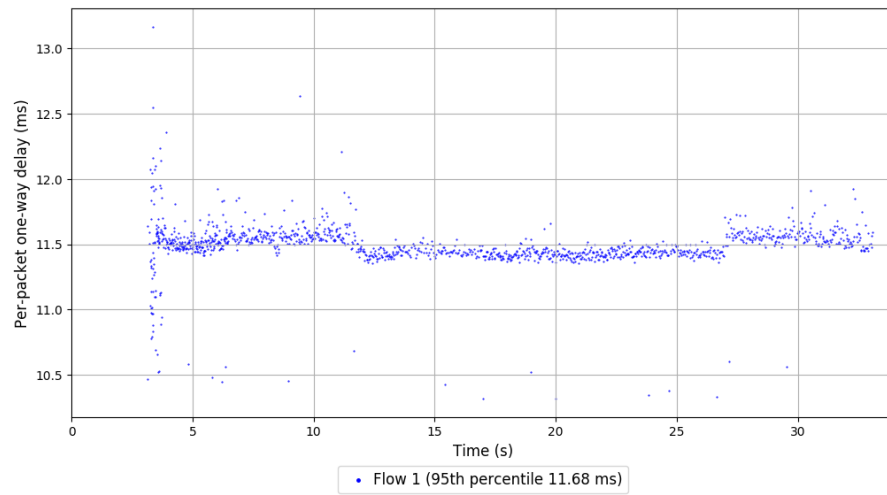
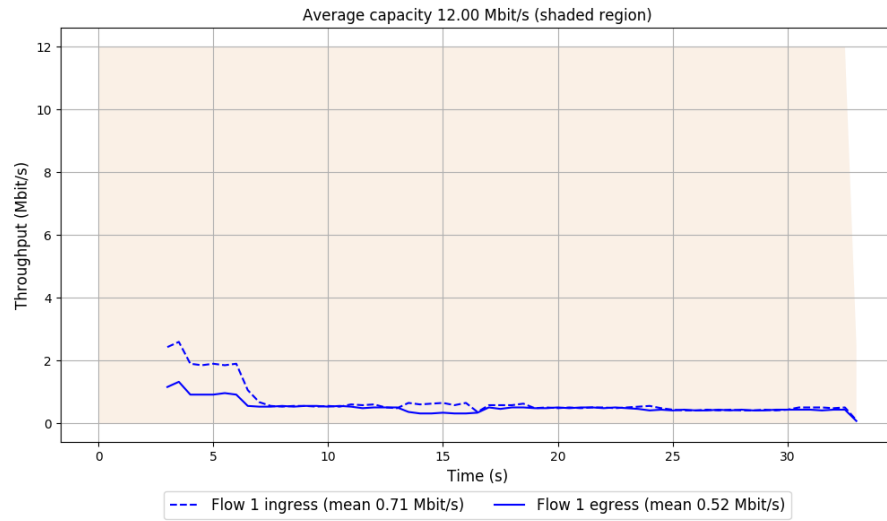
-- Flow 1:

Average throughput: 0.52 Mbit/s

95th percentile per-packet one-way delay: 11.679 ms

Loss rate: 26.19%

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



Run 9: Statistics of TCP BBR

Start at: 2018-02-27 10:22:25

End at: 2018-02-27 10:22:55

# Below is generated by plot.py at 2018-02-27 10:36:35

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.59 Mbit/s (4.9% utilization)

95th percentile per-packet one-way delay: 11.915 ms

Loss rate: 35.26%

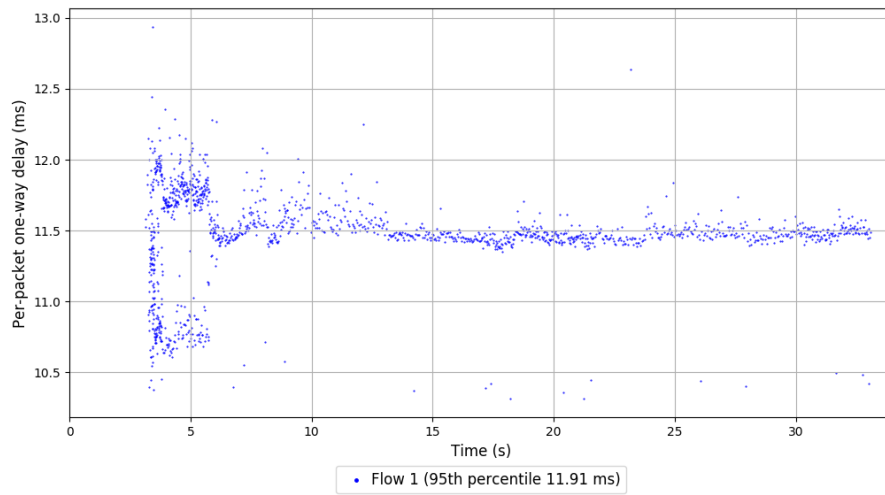
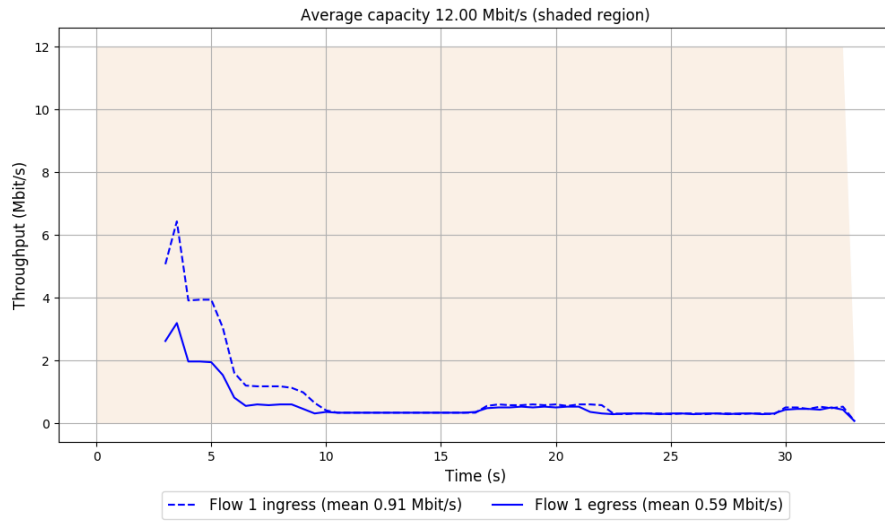
-- Flow 1:

Average throughput: 0.59 Mbit/s

95th percentile per-packet one-way delay: 11.915 ms

Loss rate: 35.26%

### Run 9: Report of TCP BBR — Data Link



Run 10: Statistics of TCP BBR

Start at: 2018-02-27 10:32:37

End at: 2018-02-27 10:33:07

# Below is generated by plot.py at 2018-02-27 10:36:37

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.48 Mbit/s (4.0% utilization)

95th percentile per-packet one-way delay: 12.011 ms

Loss rate: 30.24%

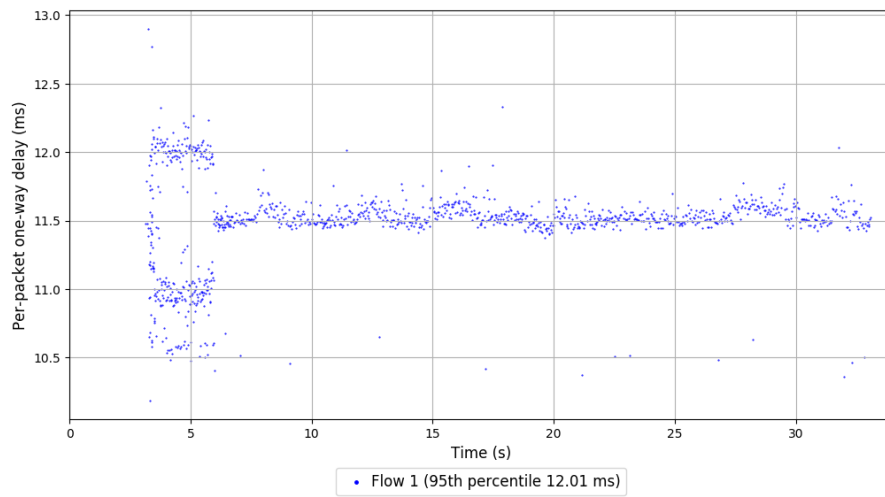
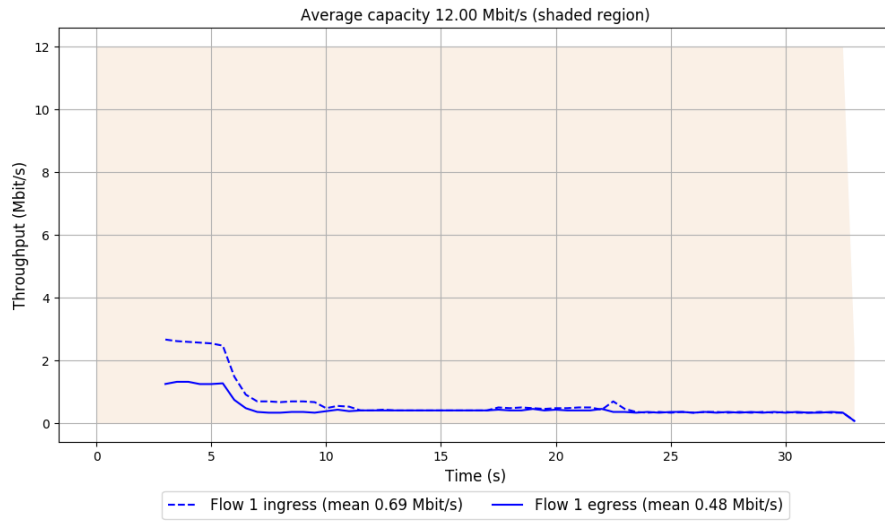
-- Flow 1:

Average throughput: 0.48 Mbit/s

95th percentile per-packet one-way delay: 12.011 ms

Loss rate: 30.24%

### Run 10: Report of TCP BBR — Data Link



Run 1: Statistics of TCP Cubic

Start at: 2018-02-27 09:01:17

End at: 2018-02-27 09:01:47

# Below is generated by plot.py at 2018-02-27 10:36:39

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.83 Mbit/s (6.9% utilization)

95th percentile per-packet one-way delay: 11.566 ms

Loss rate: 17.98%

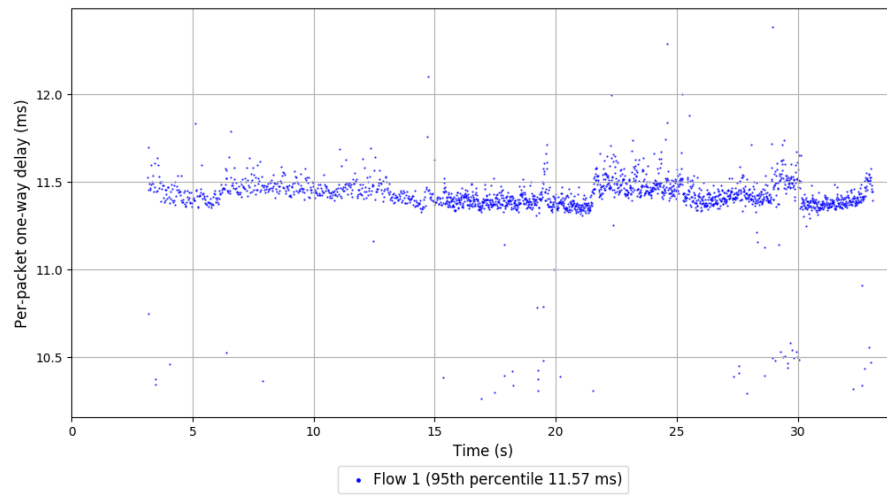
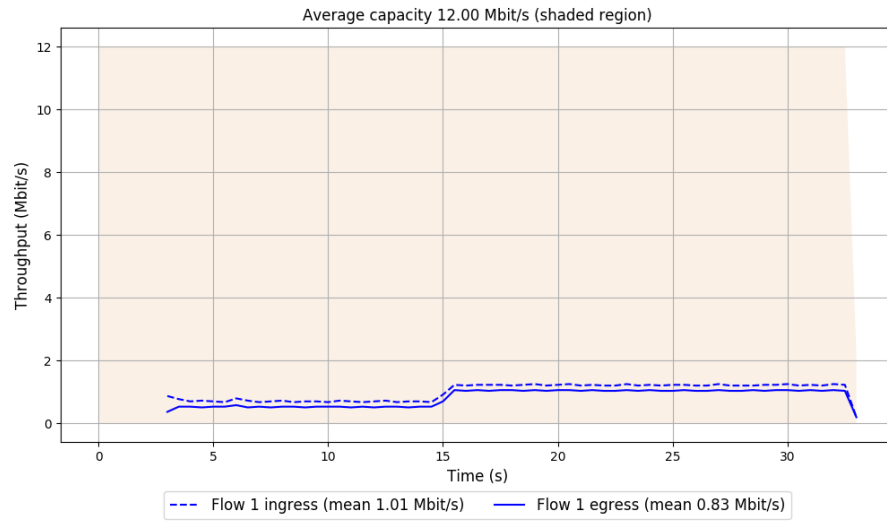
-- Flow 1:

Average throughput: 0.83 Mbit/s

95th percentile per-packet one-way delay: 11.566 ms

Loss rate: 17.98%

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



Run 2: Statistics of TCP Cubic

Start at: 2018-02-27 09:11:28

End at: 2018-02-27 09:11:58

# Below is generated by plot.py at 2018-02-27 10:36:40

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.73 Mbit/s (6.1% utilization)

95th percentile per-packet one-way delay: 11.614 ms

Loss rate: 19.90%

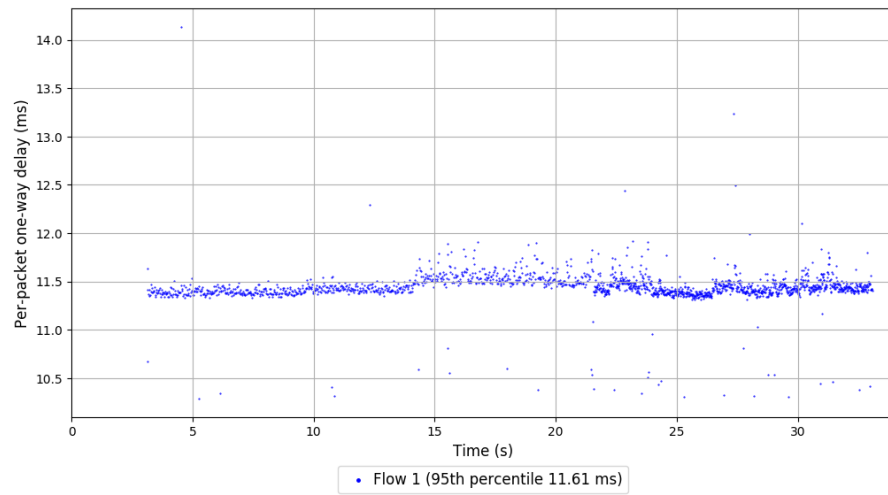
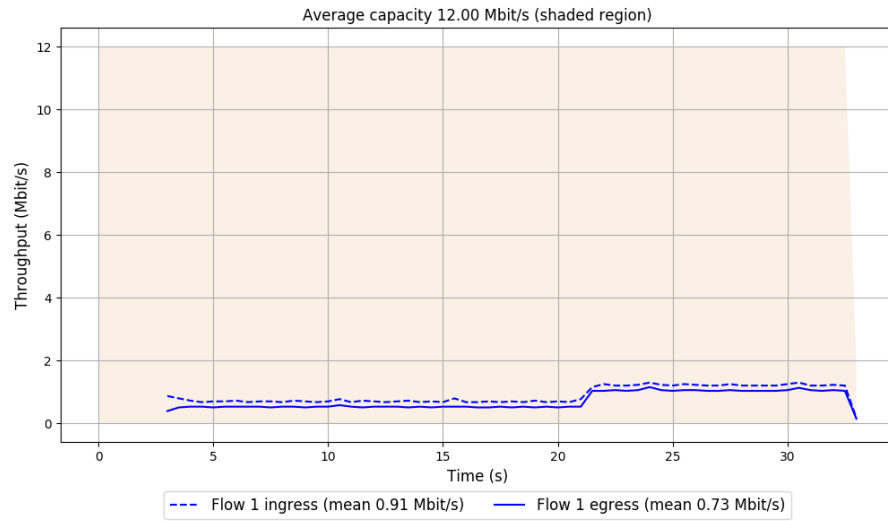
-- Flow 1:

Average throughput: 0.73 Mbit/s

95th percentile per-packet one-way delay: 11.614 ms

Loss rate: 19.90%

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



Run 3: Statistics of TCP Cubic

Start at: 2018-02-27 09:21:40

End at: 2018-02-27 09:22:10

# Below is generated by plot.py at 2018-02-27 10:36:40

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.65 Mbit/s (5.4% utilization)

95th percentile per-packet one-way delay: 11.575 ms

Loss rate: 21.93%

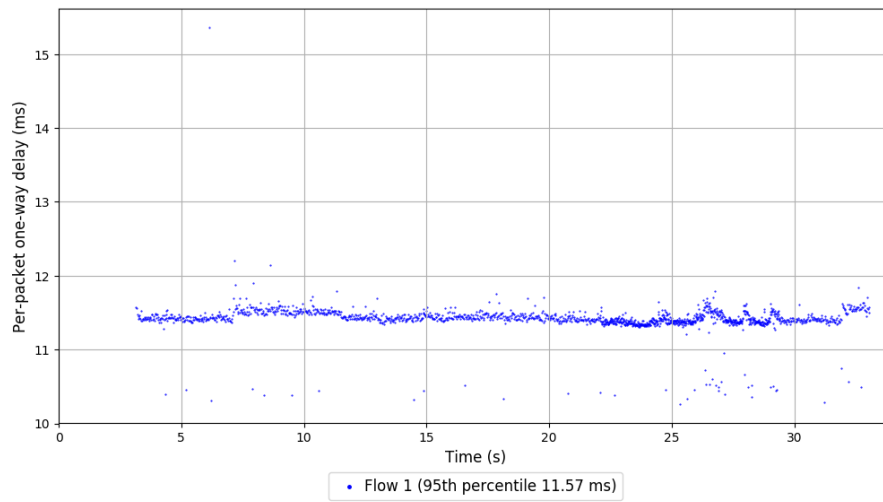
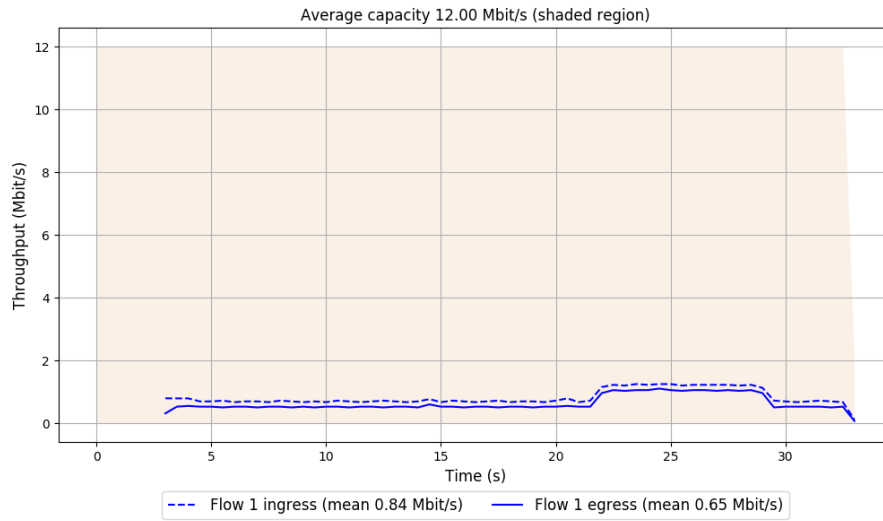
-- Flow 1:

Average throughput: 0.65 Mbit/s

95th percentile per-packet one-way delay: 11.575 ms

Loss rate: 21.93%

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



Run 4: Statistics of TCP Cubic

Start at: 2018-02-27 09:31:55

End at: 2018-02-27 09:32:25

# Below is generated by plot.py at 2018-02-27 10:36:40

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.70 Mbit/s (5.8% utilization)

95th percentile per-packet one-way delay: 11.501 ms

Loss rate: 20.59%

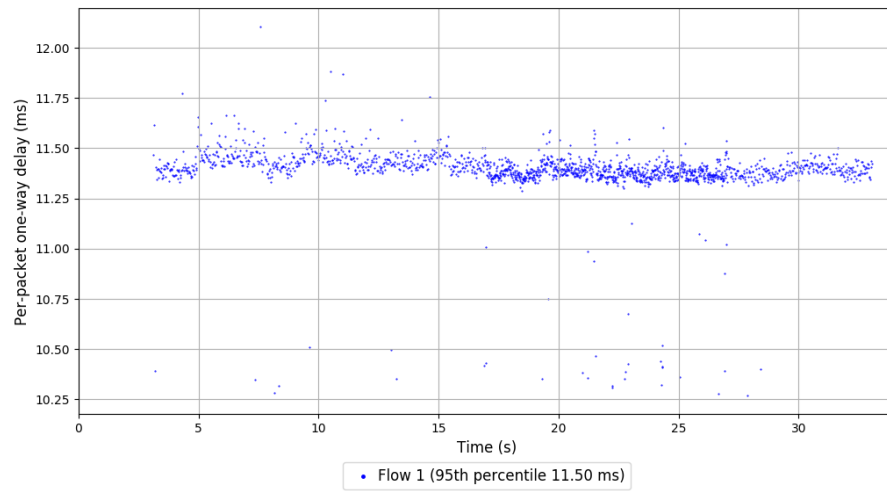
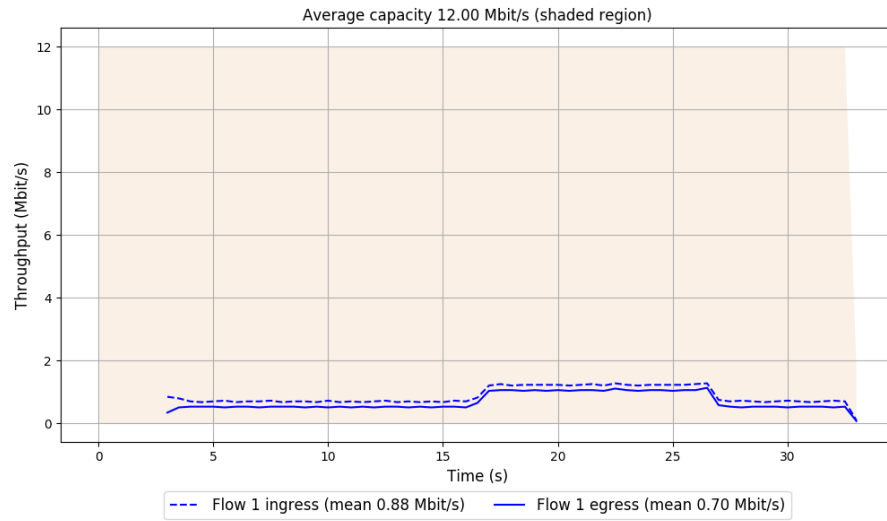
-- Flow 1:

Average throughput: 0.70 Mbit/s

95th percentile per-packet one-way delay: 11.501 ms

Loss rate: 20.59%

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



Run 5: Statistics of TCP Cubic

Start at: 2018-02-27 09:42:09

End at: 2018-02-27 09:42:39

# Below is generated by plot.py at 2018-02-27 10:36:41

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.58 Mbit/s (4.8% utilization)

95th percentile per-packet one-way delay: 11.472 ms

Loss rate: 24.01%

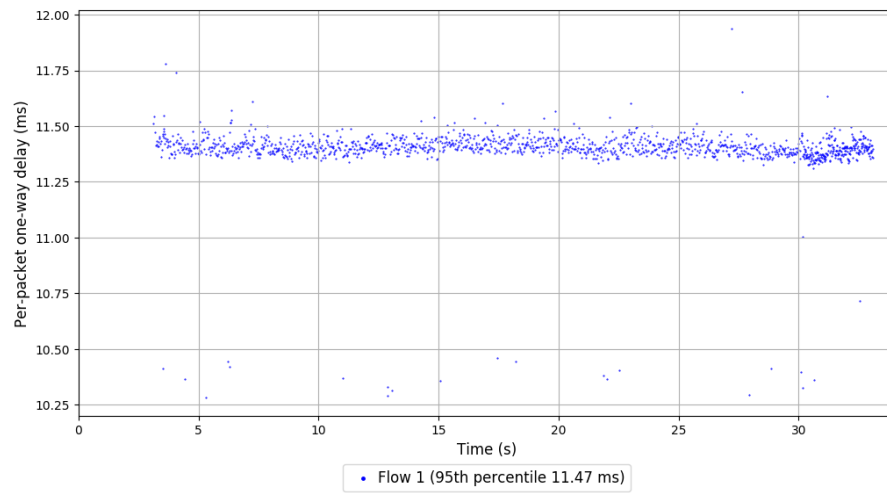
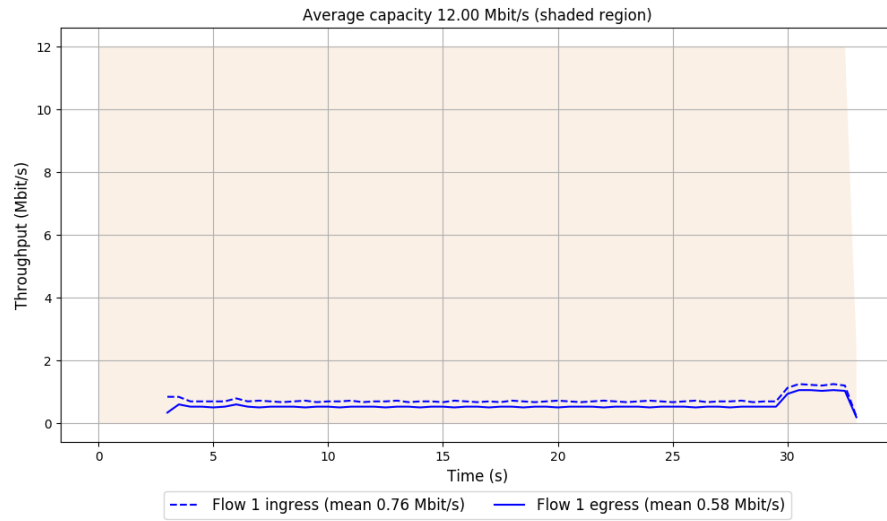
-- Flow 1:

Average throughput: 0.58 Mbit/s

95th percentile per-packet one-way delay: 11.472 ms

Loss rate: 24.01%

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



Run 6: Statistics of TCP Cubic

Start at: 2018-02-27 09:52:22

End at: 2018-02-27 09:52:52

# Below is generated by plot.py at 2018-02-27 10:36:41

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.81 Mbit/s (6.8% utilization)

95th percentile per-packet one-way delay: 11.551 ms

Loss rate: 18.28%

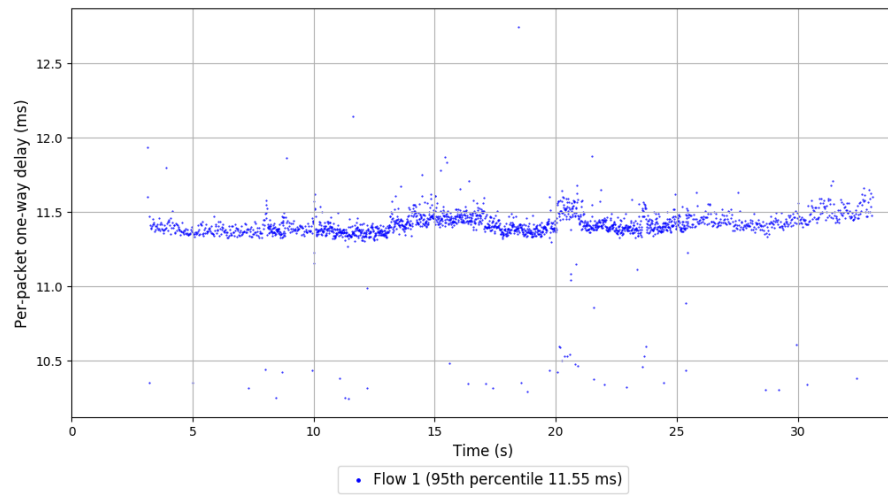
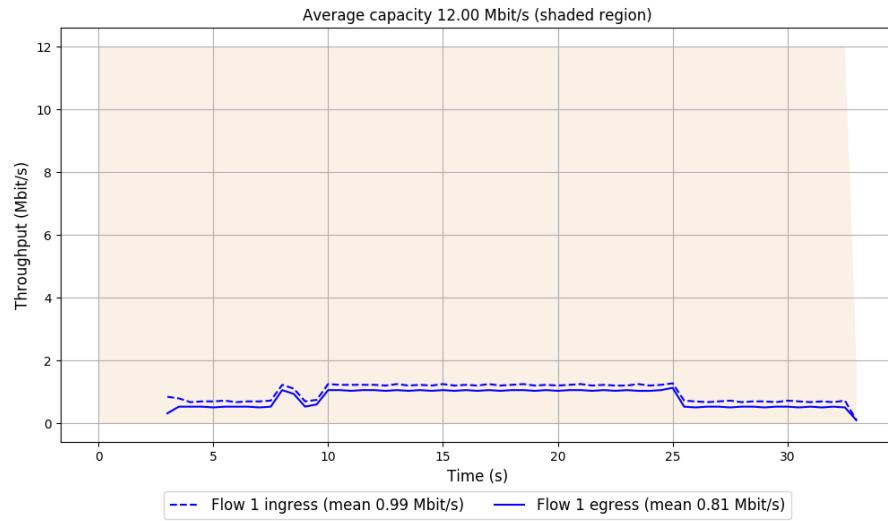
-- Flow 1:

Average throughput: 0.81 Mbit/s

95th percentile per-packet one-way delay: 11.551 ms

Loss rate: 18.28%

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



Run 7: Statistics of TCP Cubic

Start at: 2018-02-27 10:02:33

End at: 2018-02-27 10:03:03

# Below is generated by plot.py at 2018-02-27 10:36:45

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.87 Mbit/s (7.2% utilization)

95th percentile per-packet one-way delay: 11.517 ms

Loss rate: 17.40%

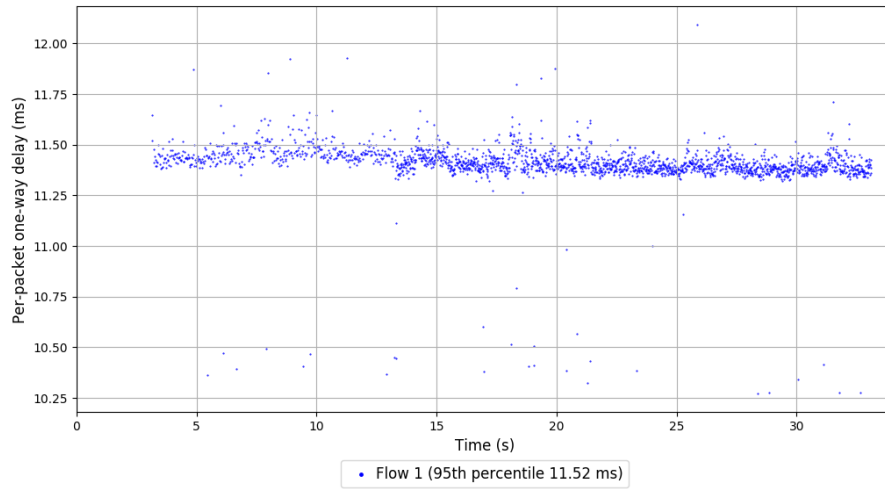
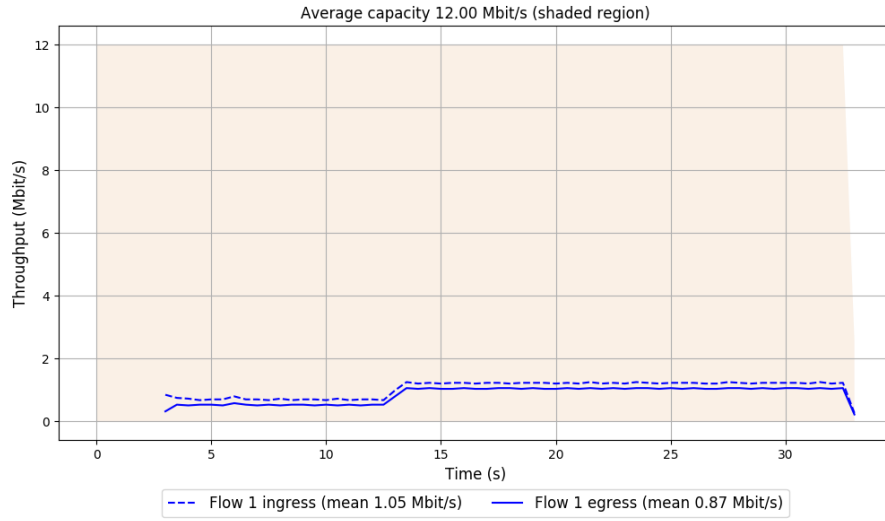
-- Flow 1:

Average throughput: 0.87 Mbit/s

95th percentile per-packet one-way delay: 11.517 ms

Loss rate: 17.40%

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



Run 8: Statistics of TCP Cubic

Start at: 2018-02-27 10:12:44

End at: 2018-02-27 10:13:14

# Below is generated by plot.py at 2018-02-27 10:36:45

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.64 Mbit/s (5.3% utilization)

95th percentile per-packet one-way delay: 11.642 ms

Loss rate: 22.17%

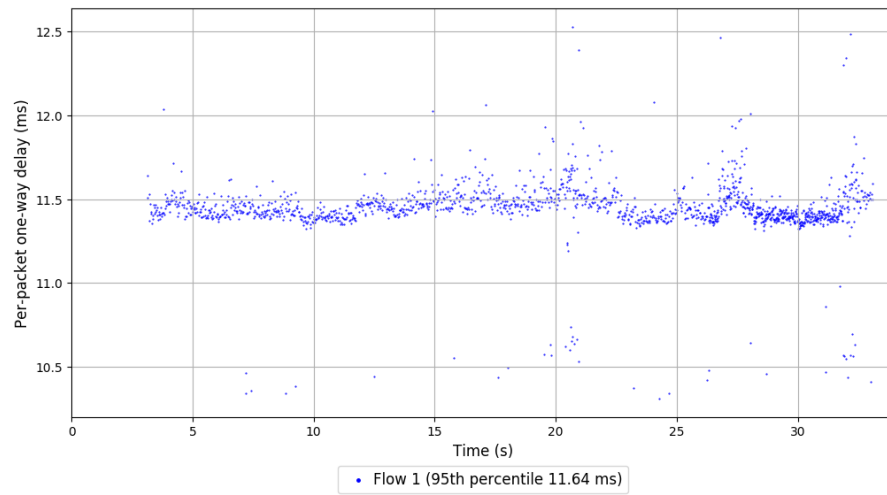
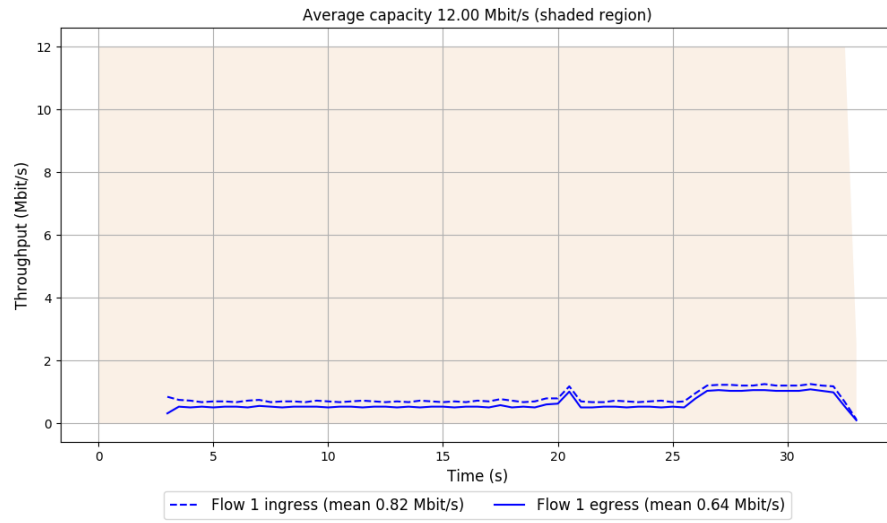
-- Flow 1:

Average throughput: 0.64 Mbit/s

95th percentile per-packet one-way delay: 11.642 ms

Loss rate: 22.17%

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



Run 9: Statistics of TCP Cubic

Start at: 2018-02-27 10:22:58

End at: 2018-02-27 10:23:28

# Below is generated by plot.py at 2018-02-27 10:36:49

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.88 Mbit/s (7.4% utilization)

95th percentile per-packet one-way delay: 11.642 ms

Loss rate: 17.00%

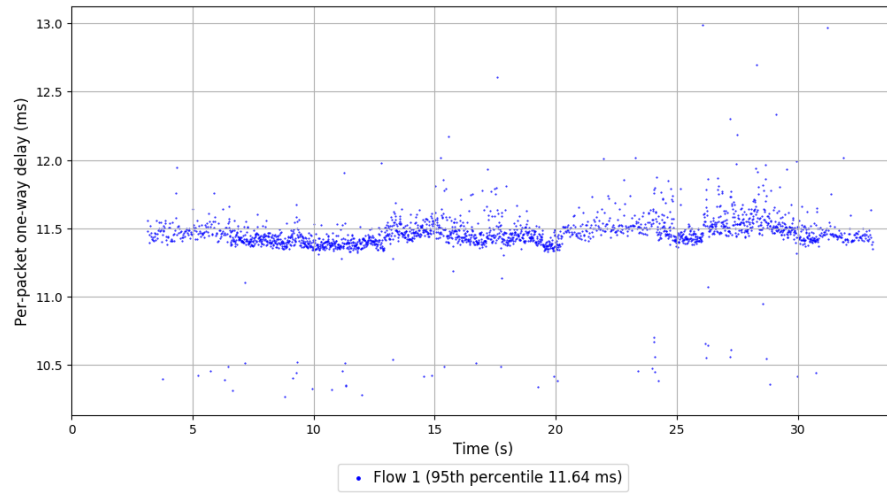
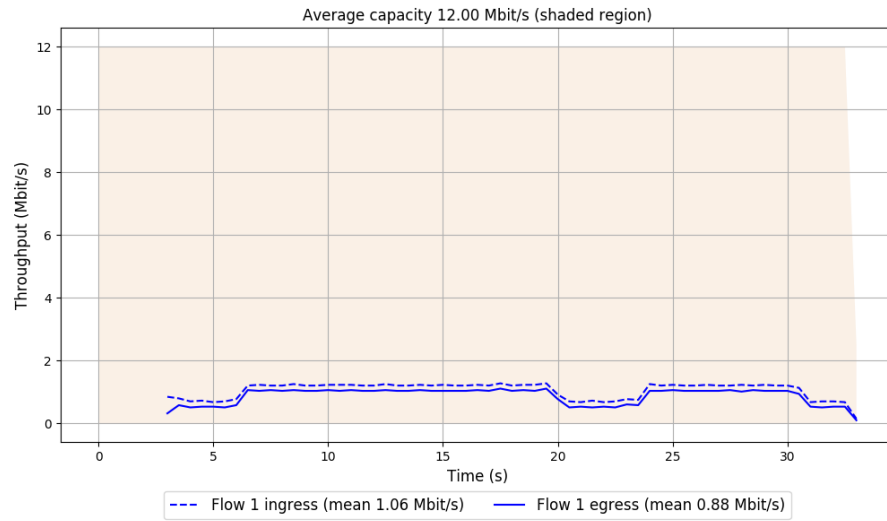
-- Flow 1:

Average throughput: 0.88 Mbit/s

95th percentile per-packet one-way delay: 11.642 ms

Loss rate: 17.00%

### Run 9: Report of TCP Cubic — Data Link



Run 10: Statistics of TCP Cubic

Start at: 2018-02-27 10:33:10

End at: 2018-02-27 10:33:40

# Below is generated by plot.py at 2018-02-27 10:36:50

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.92 Mbit/s (7.7% utilization)

95th percentile per-packet one-way delay: 11.546 ms

Loss rate: 16.21%

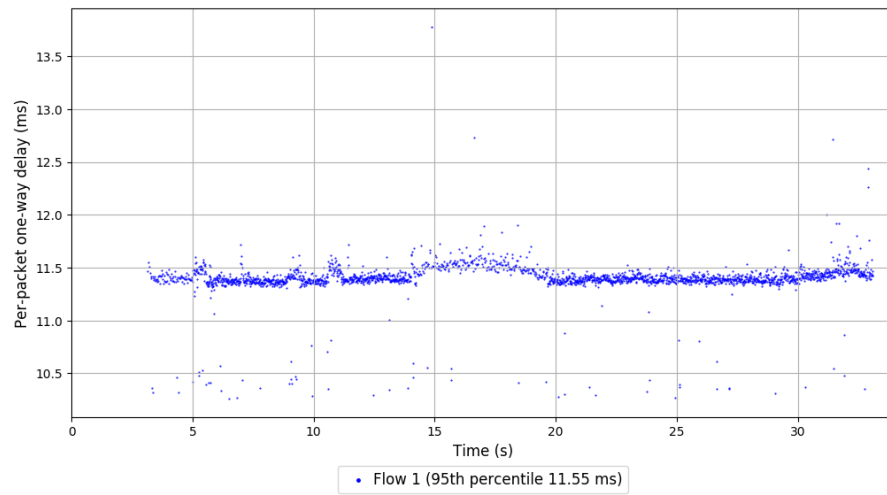
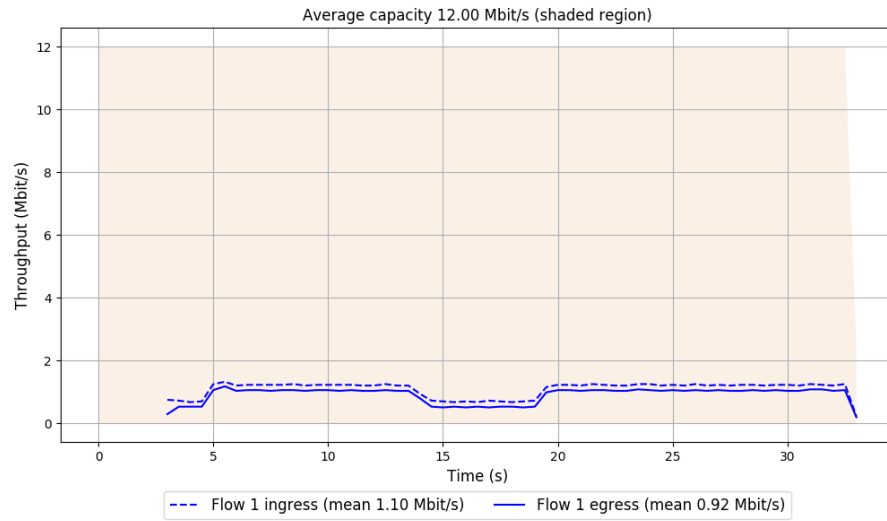
-- Flow 1:

Average throughput: 0.92 Mbit/s

95th percentile per-packet one-way delay: 11.546 ms

Loss rate: 16.21%

### Run 10: Report of TCP Cubic — Data Link



Run 1: Statistics of LEDBAT

Start at: 2018-02-27 08:56:12

End at: 2018-02-27 08:56:42

# Below is generated by plot.py at 2018-02-27 10:36:50

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.24 Mbit/s (2.0% utilization)

95th percentile per-packet one-way delay: 11.475 ms

Loss rate: 50.60%

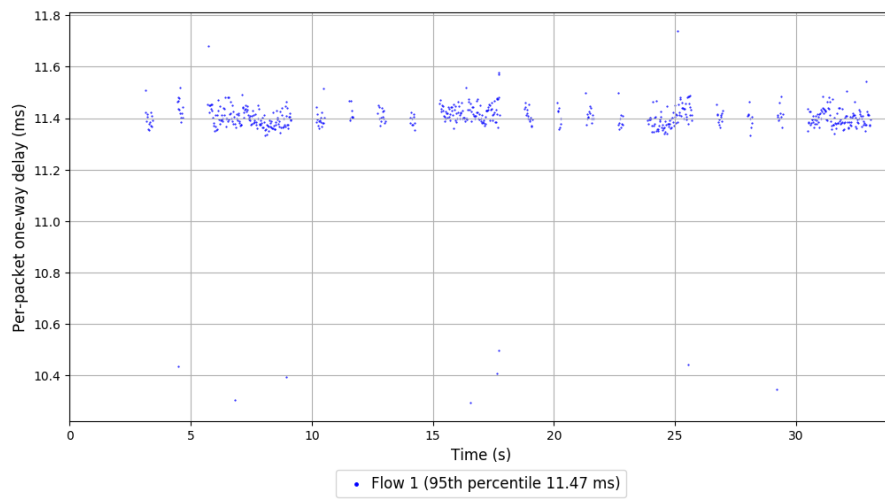
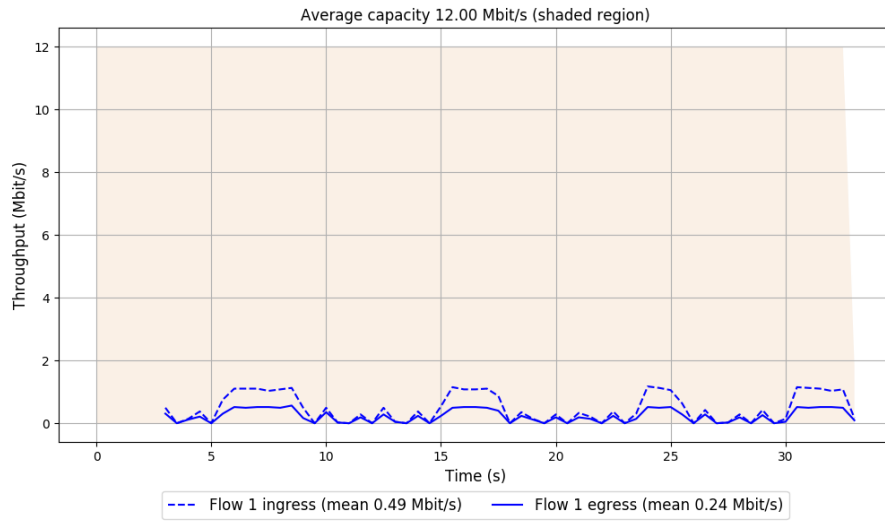
-- Flow 1:

Average throughput: 0.24 Mbit/s

95th percentile per-packet one-way delay: 11.475 ms

Loss rate: 50.60%

# Run 1: Report of LEDBAT — Data Link



Run 2: Statistics of LEDBAT

Start at: 2018-02-27 09:06:23

End at: 2018-02-27 09:06:53

# Below is generated by plot.py at 2018-02-27 10:36:50

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.26 Mbit/s (2.2% utilization)

95th percentile per-packet one-way delay: 11.605 ms

Loss rate: 51.09%

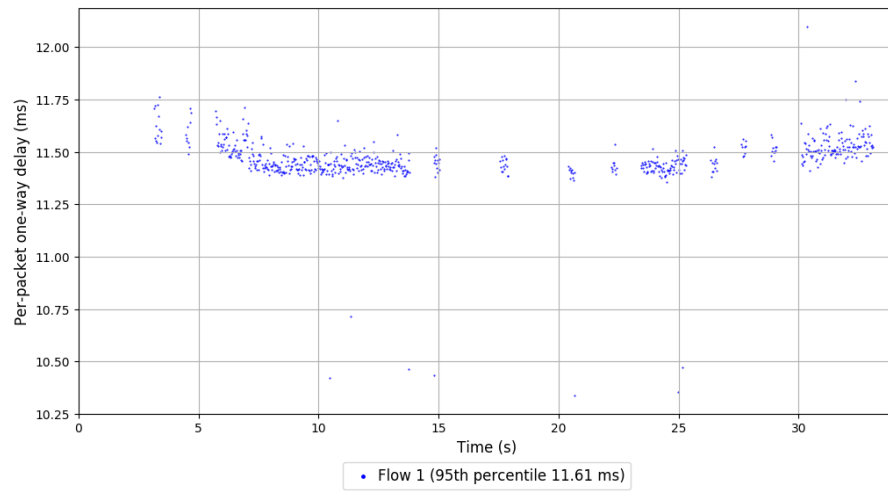
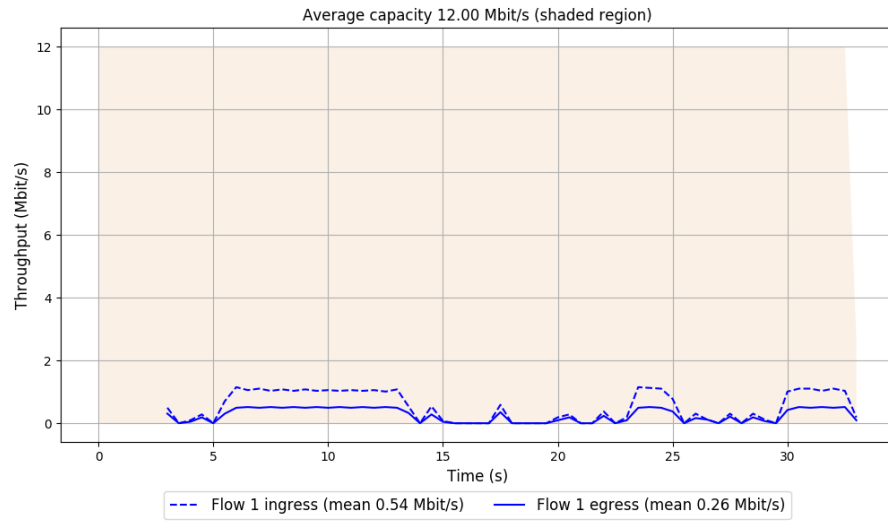
-- Flow 1:

Average throughput: 0.26 Mbit/s

95th percentile per-packet one-way delay: 11.605 ms

Loss rate: 51.09%

## Run 2: Report of LEDBAT — Data Link



Run 3: Statistics of LEDBAT

Start at: 2018-02-27 09:16:34

End at: 2018-02-27 09:17:04

# Below is generated by plot.py at 2018-02-27 10:36:50

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.20 Mbit/s (1.6% utilization)

95th percentile per-packet one-way delay: 11.562 ms

Loss rate: 48.47%

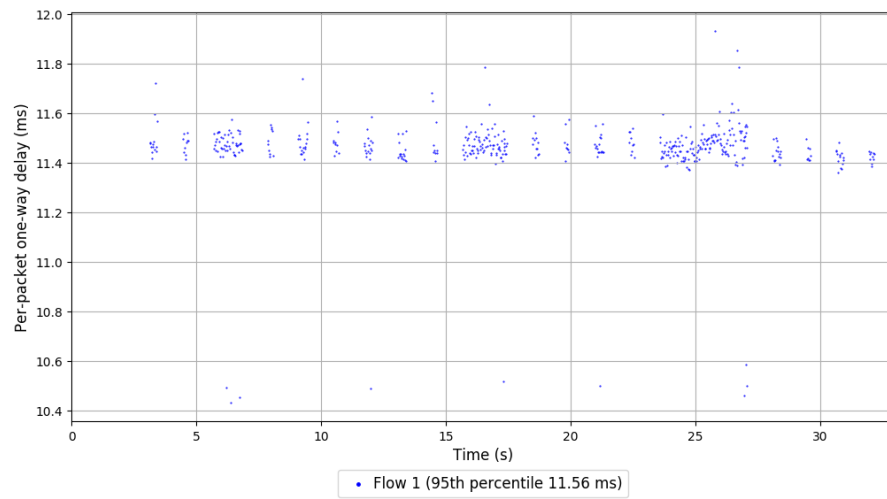
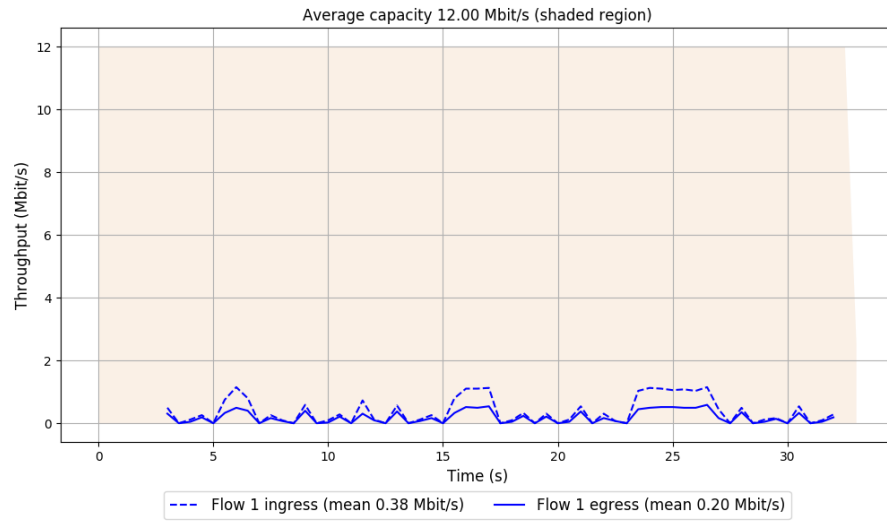
-- Flow 1:

Average throughput: 0.20 Mbit/s

95th percentile per-packet one-way delay: 11.562 ms

Loss rate: 48.47%

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



Run 4: Statistics of LEDBAT

Start at: 2018-02-27 09:26:49

End at: 2018-02-27 09:27:19

# Below is generated by plot.py at 2018-02-27 10:36:50

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.22 Mbit/s (1.9% utilization)

95th percentile per-packet one-way delay: 11.508 ms

Loss rate: 49.82%

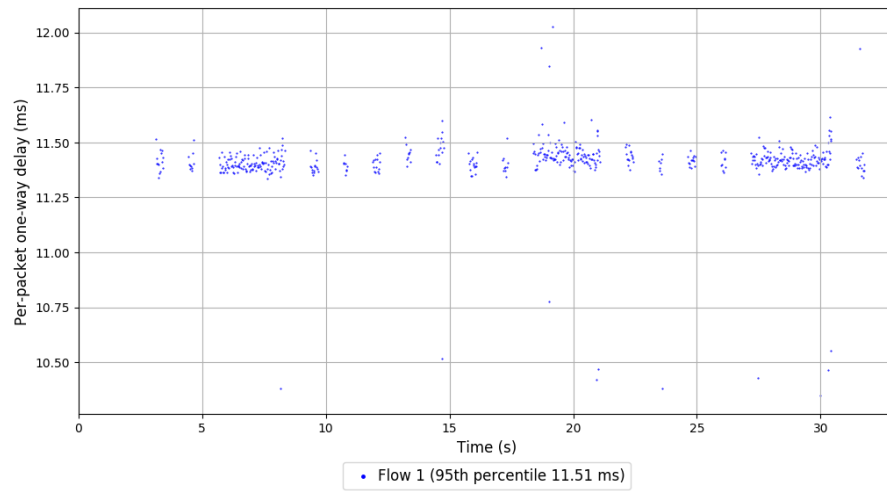
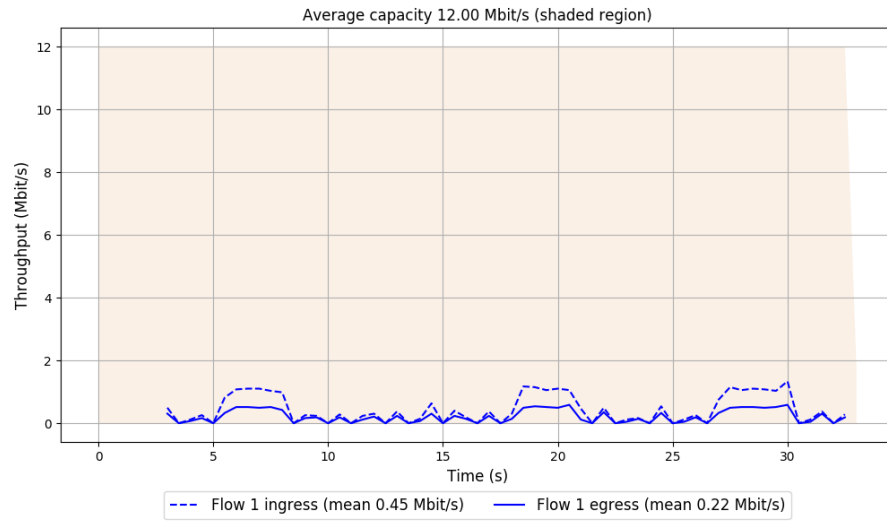
-- Flow 1:

Average throughput: 0.22 Mbit/s

95th percentile per-packet one-way delay: 11.508 ms

Loss rate: 49.82%

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



Run 5: Statistics of LEDBAT

Start at: 2018-02-27 09:37:04

End at: 2018-02-27 09:37:34

# Below is generated by plot.py at 2018-02-27 10:36:53

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.17 Mbit/s (1.4% utilization)

95th percentile per-packet one-way delay: 11.699 ms

Loss rate: 47.03%

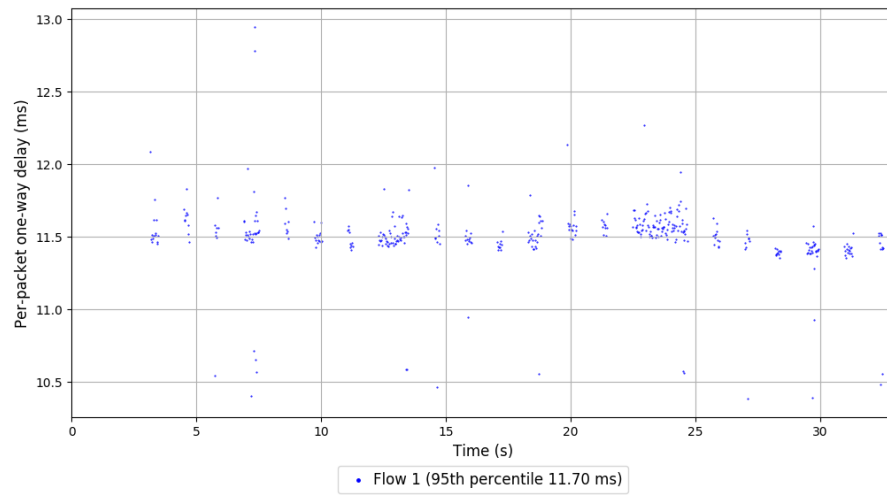
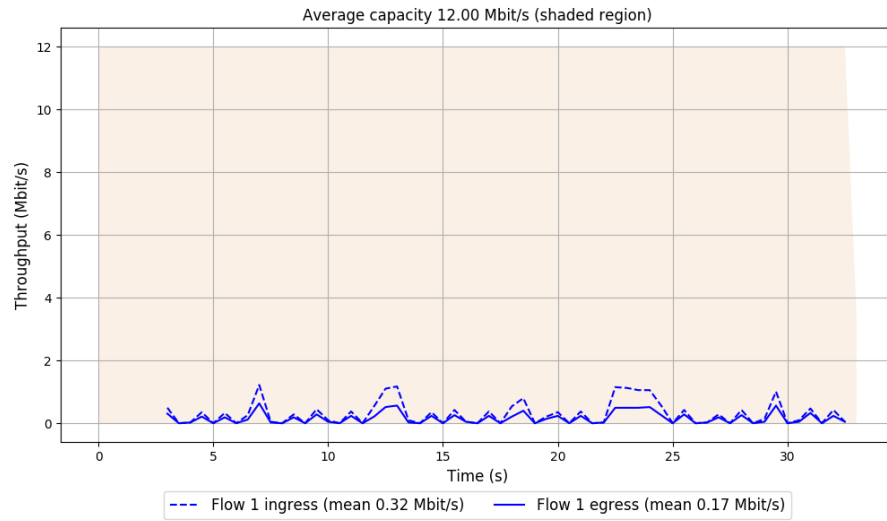
-- Flow 1:

Average throughput: 0.17 Mbit/s

95th percentile per-packet one-way delay: 11.699 ms

Loss rate: 47.03%

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



Run 6: Statistics of LEDBAT

Start at: 2018-02-27 09:47:16

End at: 2018-02-27 09:47:46

# Below is generated by plot.py at 2018-02-27 10:36:54

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.22 Mbit/s (1.9% utilization)

95th percentile per-packet one-way delay: 11.481 ms

Loss rate: 49.73%

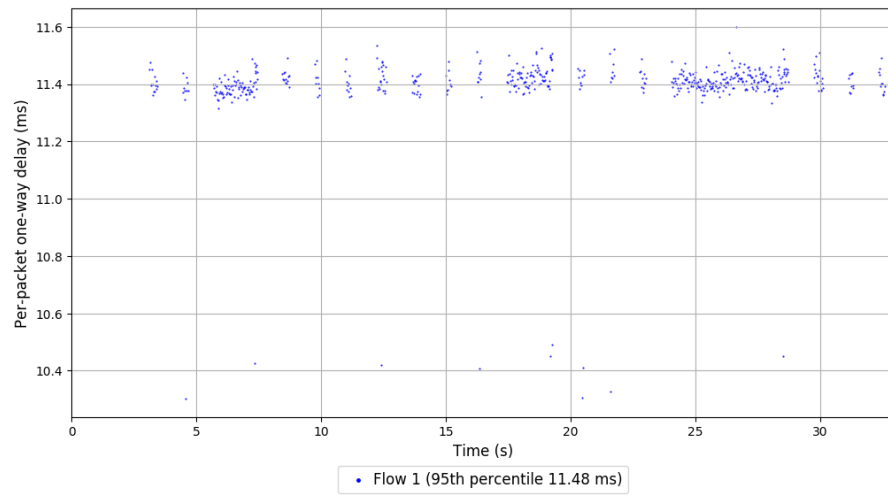
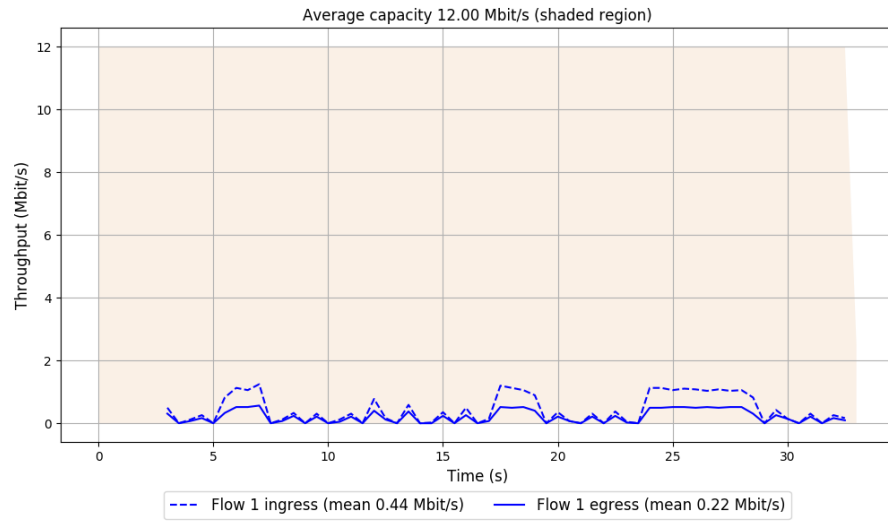
-- Flow 1:

Average throughput: 0.22 Mbit/s

95th percentile per-packet one-way delay: 11.481 ms

Loss rate: 49.73%

## Run 6: Report of LEDBAT — Data Link



Run 7: Statistics of LEDBAT

Start at: 2018-02-27 09:57:27

End at: 2018-02-27 09:57:57

# Below is generated by plot.py at 2018-02-27 10:36:57

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.21 Mbit/s (1.7% utilization)

95th percentile per-packet one-way delay: 11.727 ms

Loss rate: 49.76%

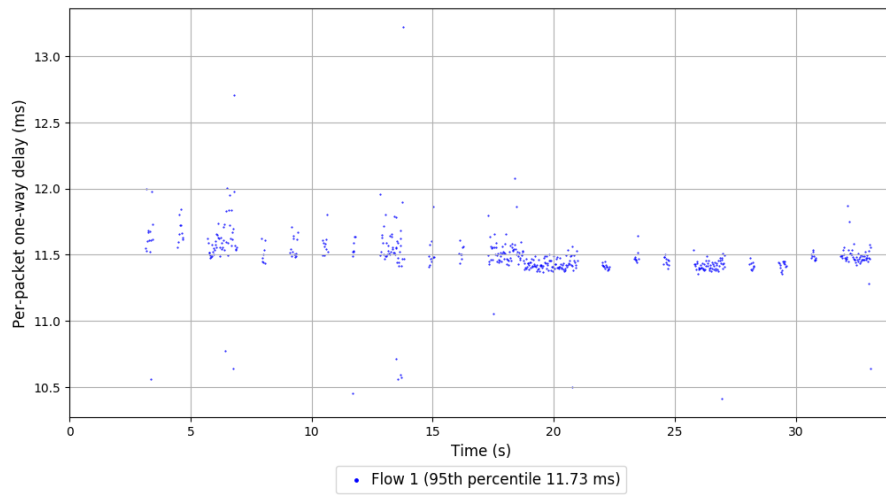
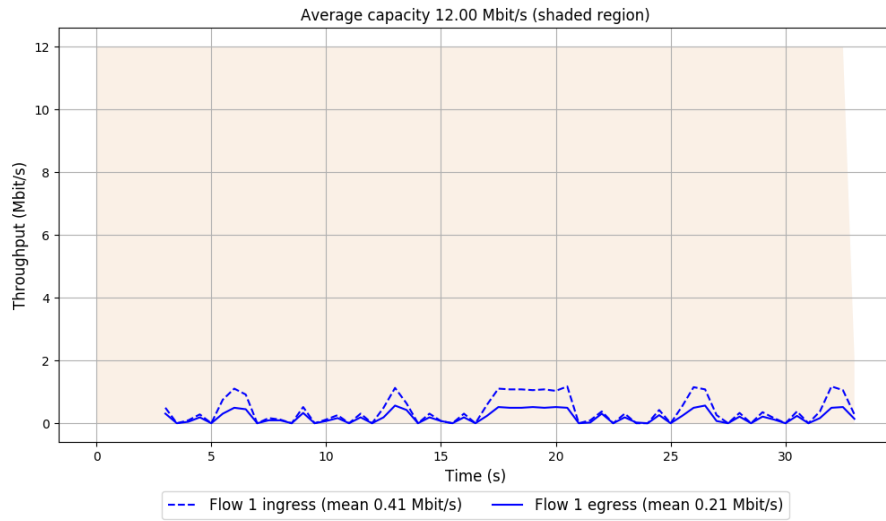
-- Flow 1:

Average throughput: 0.21 Mbit/s

95th percentile per-packet one-way delay: 11.727 ms

Loss rate: 49.76%

## Run 7: Report of LEDBAT — Data Link



Run 8: Statistics of LEDBAT

Start at: 2018-02-27 10:07:38

End at: 2018-02-27 10:08:08

# Below is generated by plot.py at 2018-02-27 10:36:57

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.20 Mbit/s (1.7% utilization)

95th percentile per-packet one-way delay: 11.503 ms

Loss rate: 48.59%

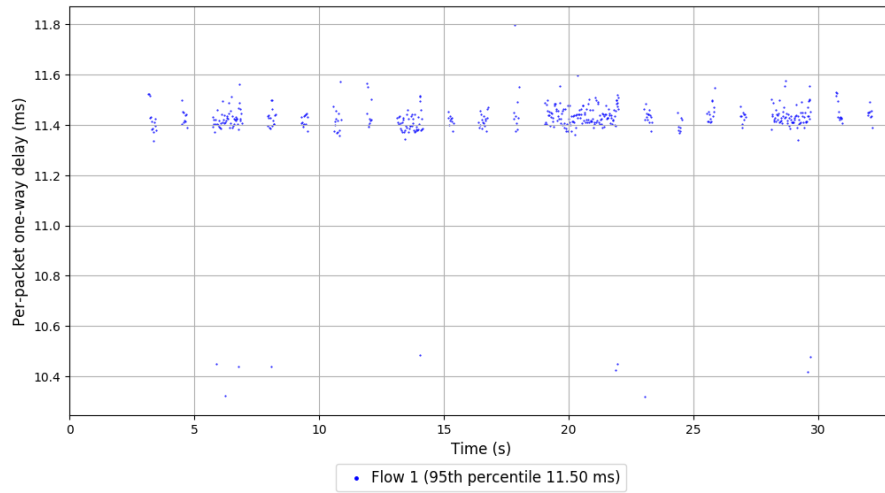
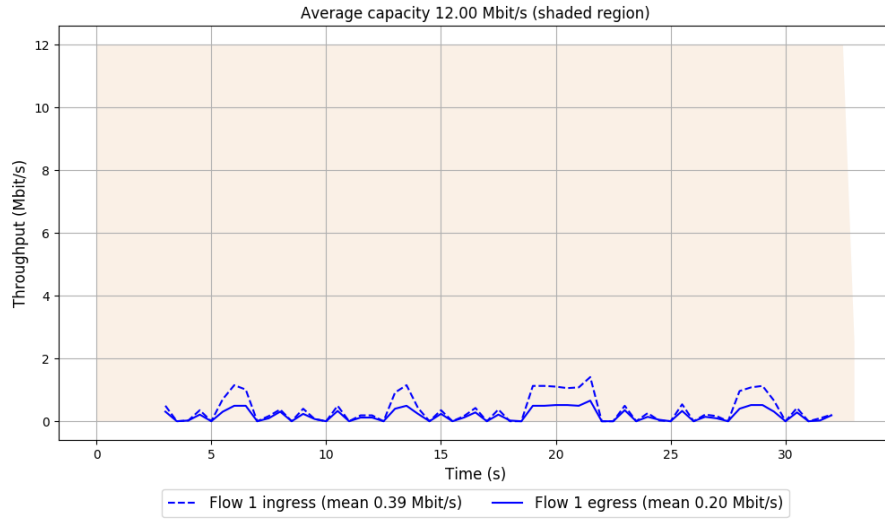
-- Flow 1:

Average throughput: 0.20 Mbit/s

95th percentile per-packet one-way delay: 11.503 ms

Loss rate: 48.59%

### Run 8: Report of LEDBAT — Data Link



Run 9: Statistics of LEDBAT

Start at: 2018-02-27 10:17:53

End at: 2018-02-27 10:18:23

# Below is generated by plot.py at 2018-02-27 10:36:57

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.24 Mbit/s (2.0% utilization)

95th percentile per-packet one-way delay: 11.536 ms

Loss rate: 50.52%

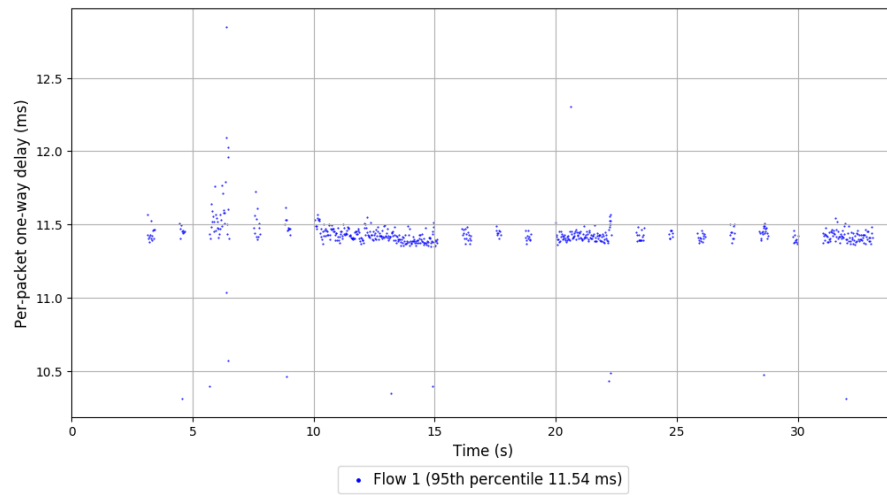
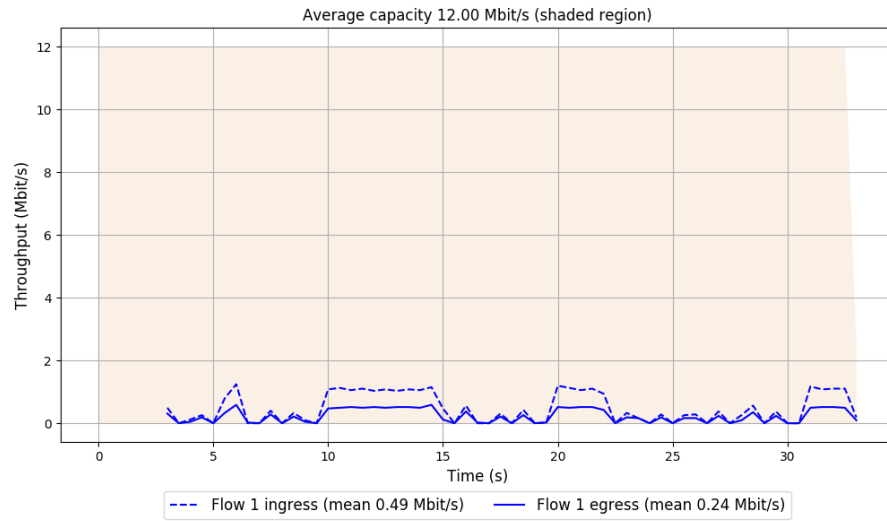
-- Flow 1:

Average throughput: 0.24 Mbit/s

95th percentile per-packet one-way delay: 11.536 ms

Loss rate: 50.52%

### Run 9: Report of LEDBAT — Data Link



Run 10: Statistics of LEDBAT

Start at: 2018-02-27 10:28:04

End at: 2018-02-27 10:28:34

# Below is generated by plot.py at 2018-02-27 10:36:58

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.19 Mbit/s (1.6% utilization)

95th percentile per-packet one-way delay: 11.609 ms

Loss rate: 47.99%

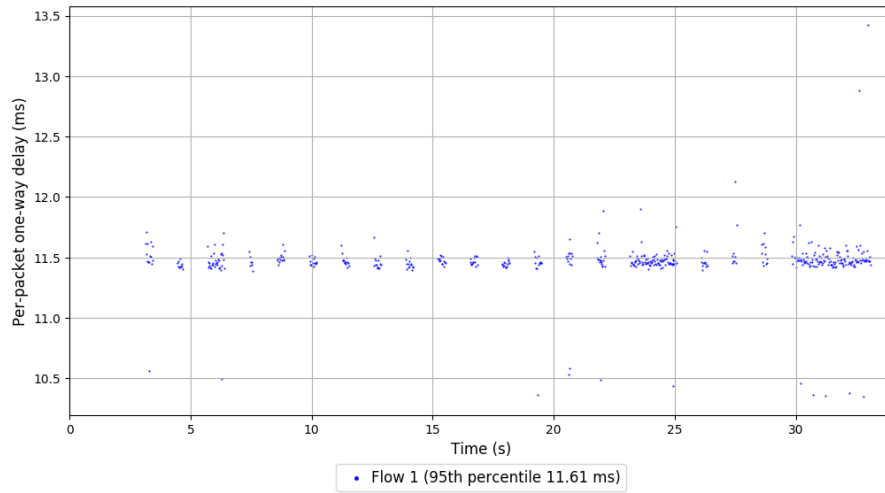
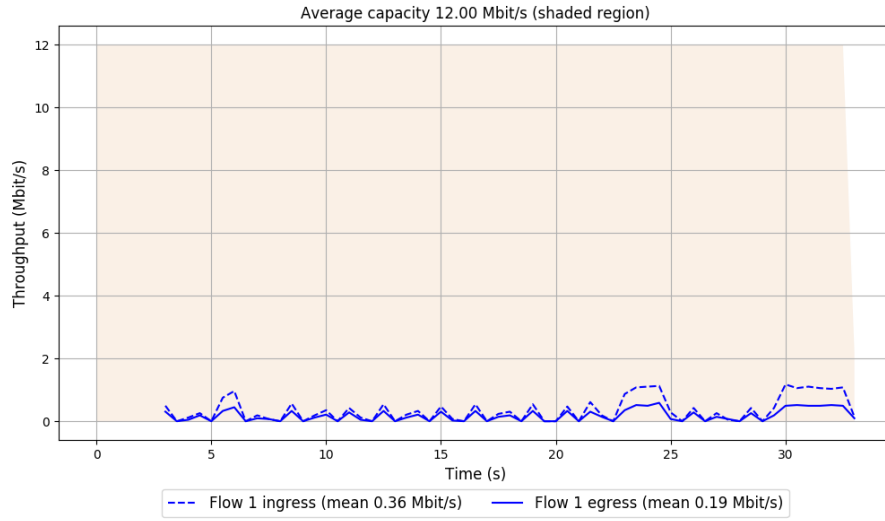
-- Flow 1:

Average throughput: 0.19 Mbit/s

95th percentile per-packet one-way delay: 11.609 ms

Loss rate: 47.99%

### Run 10: Report of LEDBAT — Data Link



Run 1: Statistics of PCC

Start at: 2018-02-27 08:53:56

End at: 2018-02-27 08:54:26

# Below is generated by plot.py at 2018-02-27 10:37:08

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 9.86 Mbit/s (82.2% utilization)

95th percentile per-packet one-way delay: 11.938 ms

Loss rate: 3.56%

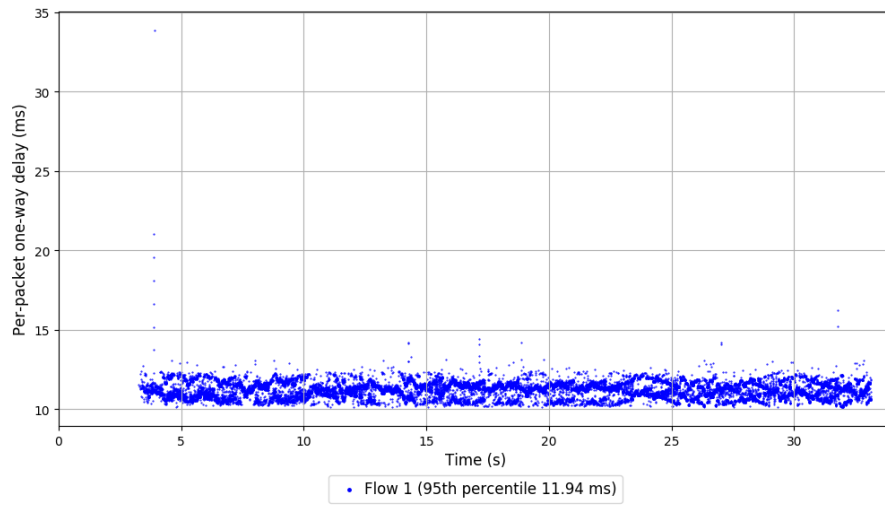
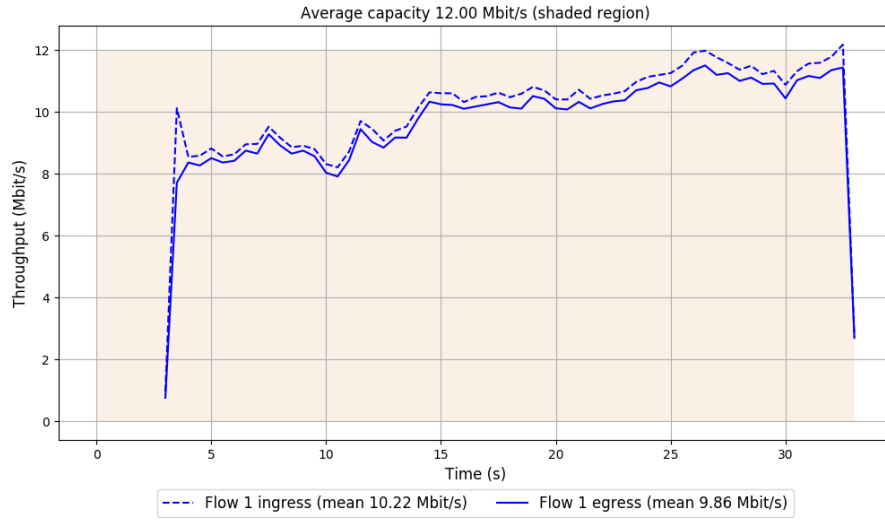
-- Flow 1:

Average throughput: 9.86 Mbit/s

95th percentile per-packet one-way delay: 11.938 ms

Loss rate: 3.56%

# Run 1: Report of PCC — Data Link



Run 2: Statistics of PCC

Start at: 2018-02-27 09:04:07

End at: 2018-02-27 09:04:37

# Below is generated by plot.py at 2018-02-27 10:37:08

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 4.23 Mbit/s (35.3% utilization)

95th percentile per-packet one-way delay: 11.964 ms

Loss rate: 3.46%

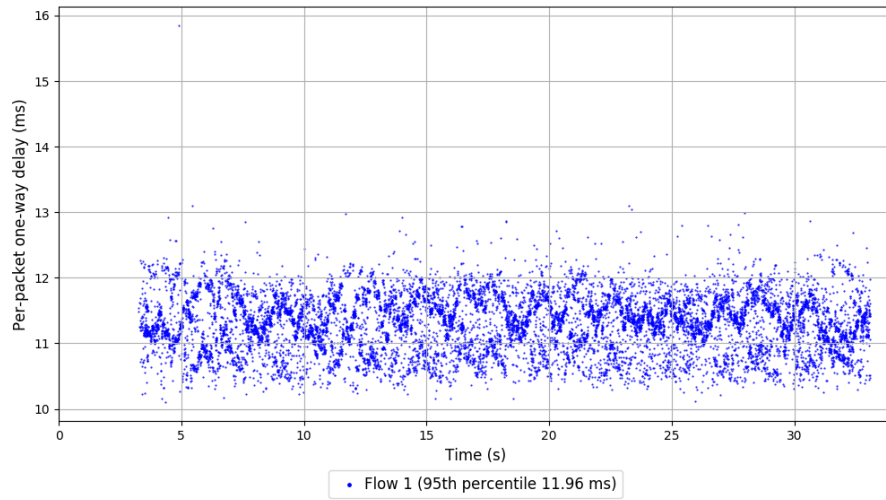
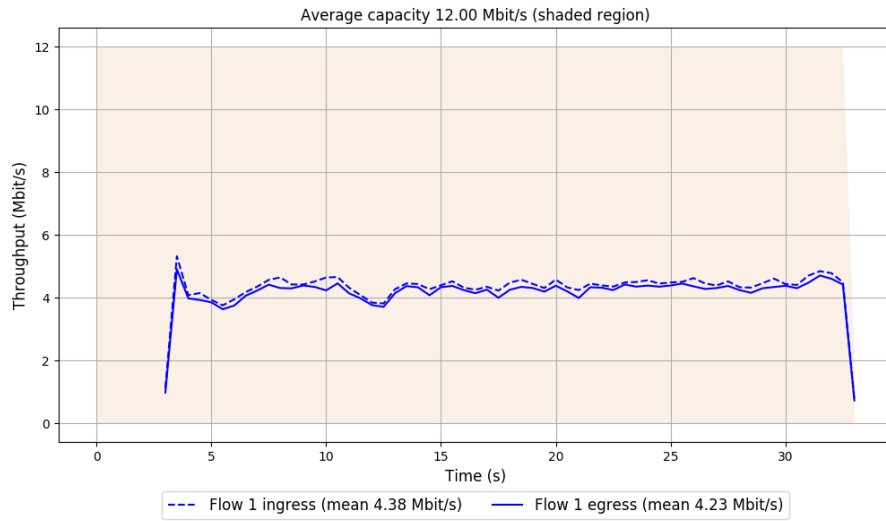
-- Flow 1:

Average throughput: 4.23 Mbit/s

95th percentile per-packet one-way delay: 11.964 ms

Loss rate: 3.46%

## Run 2: Report of PCC — Data Link



Run 3: Statistics of PCC

Start at: 2018-02-27 09:14:18

End at: 2018-02-27 09:14:48

# Below is generated by plot.py at 2018-02-27 10:37:09

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 6.14 Mbit/s (51.2% utilization)

95th percentile per-packet one-way delay: 12.086 ms

Loss rate: 3.62%

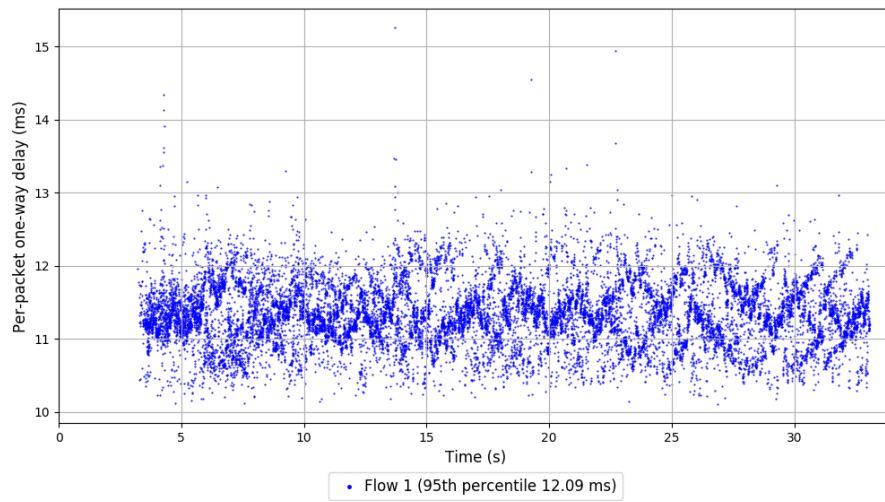
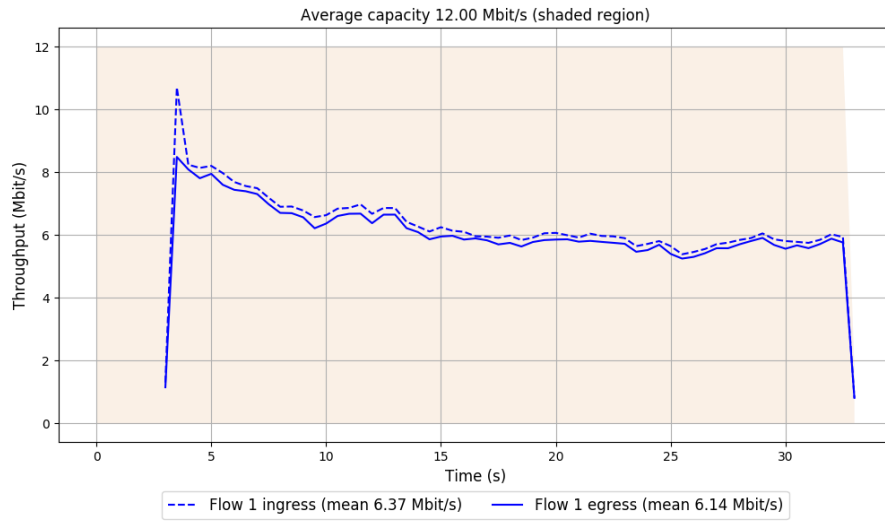
-- Flow 1:

Average throughput: 6.14 Mbit/s

95th percentile per-packet one-way delay: 12.086 ms

Loss rate: 3.62%

### Run 3: Report of PCC — Data Link



Run 4: Statistics of PCC

Start at: 2018-02-27 09:24:34

End at: 2018-02-27 09:25:04

# Below is generated by plot.py at 2018-02-27 10:37:14

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 9.12 Mbit/s (76.0% utilization)

95th percentile per-packet one-way delay: 11.950 ms

Loss rate: 3.36%

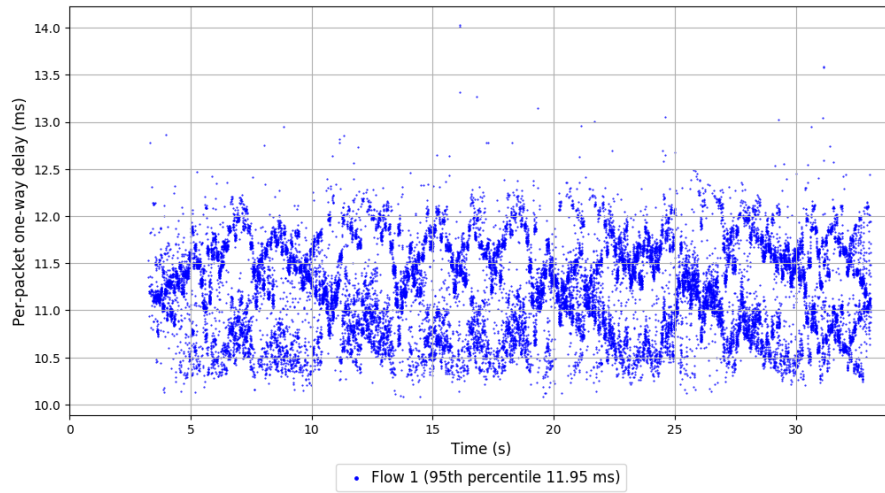
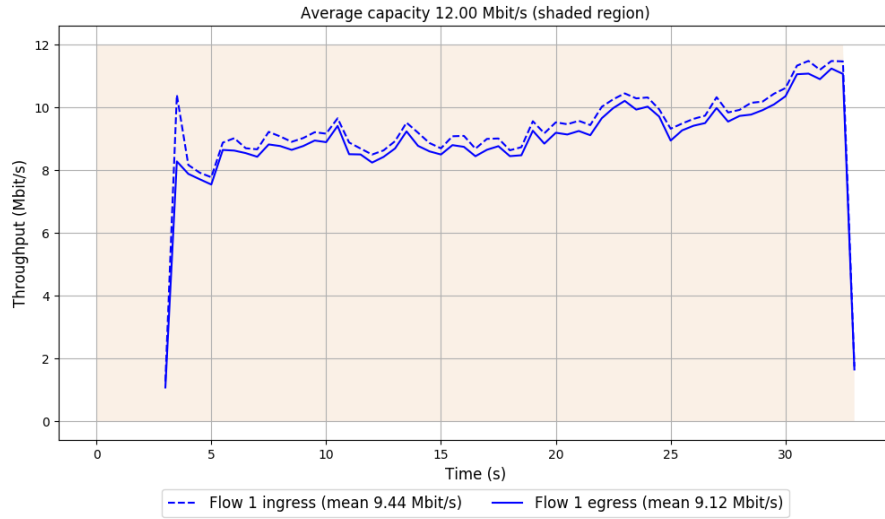
-- Flow 1:

Average throughput: 9.12 Mbit/s

95th percentile per-packet one-way delay: 11.950 ms

Loss rate: 3.36%

### Run 4: Report of PCC — Data Link



Run 5: Statistics of PCC

Start at: 2018-02-27 09:34:48

End at: 2018-02-27 09:35:19

# Below is generated by plot.py at 2018-02-27 10:37:16

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 9.38 Mbit/s (78.2% utilization)

95th percentile per-packet one-way delay: 11.949 ms

Loss rate: 3.49%

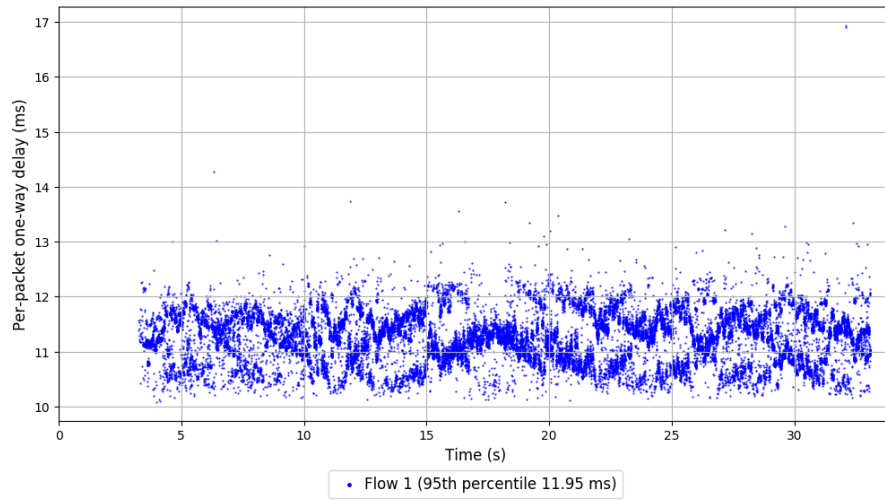
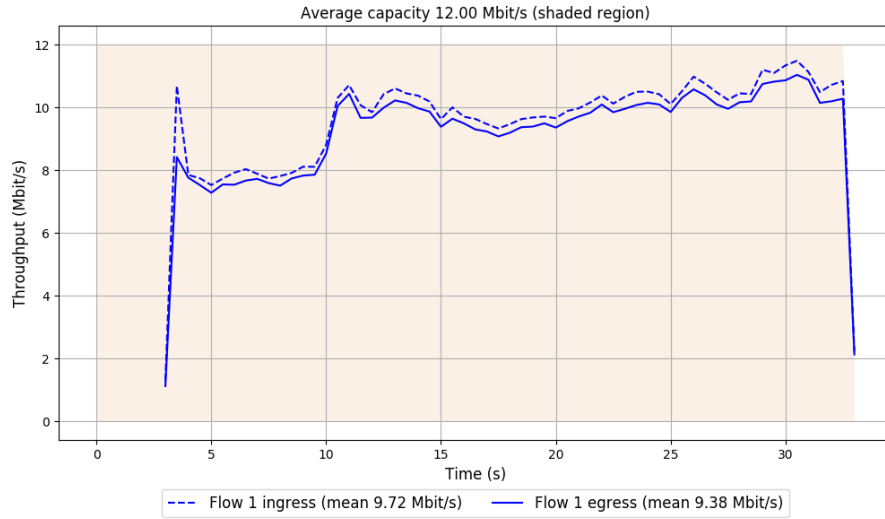
-- Flow 1:

Average throughput: 9.38 Mbit/s

95th percentile per-packet one-way delay: 11.949 ms

Loss rate: 3.49%

### Run 5: Report of PCC — Data Link



Run 6: Statistics of PCC

Start at: 2018-02-27 09:45:01

End at: 2018-02-27 09:45:31

# Below is generated by plot.py at 2018-02-27 10:37:16

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 6.89 Mbit/s (57.4% utilization)

95th percentile per-packet one-way delay: 11.964 ms

Loss rate: 3.60%

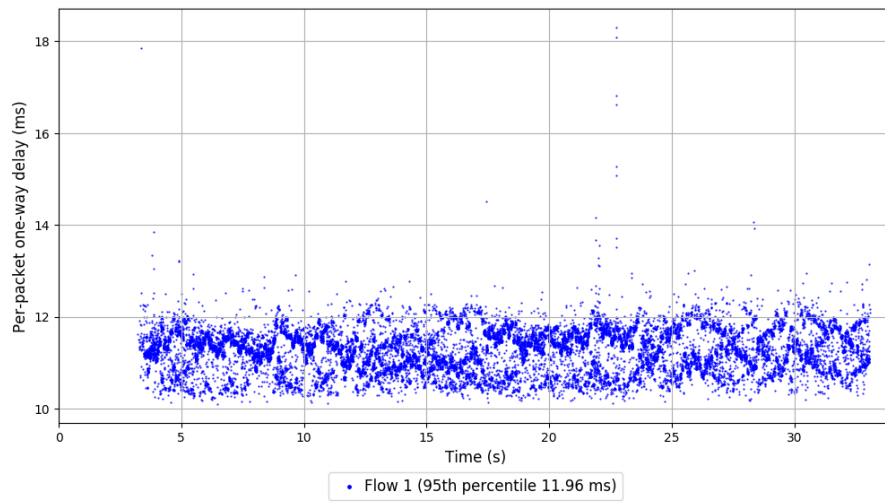
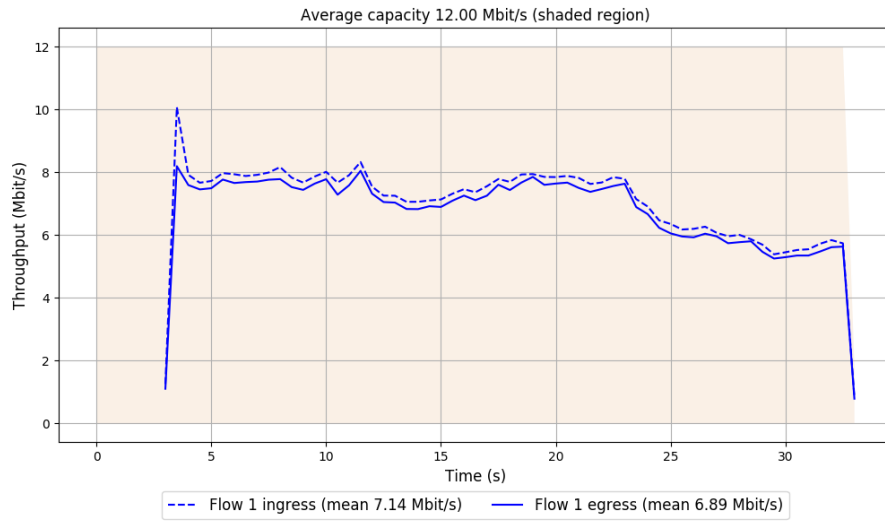
-- Flow 1:

Average throughput: 6.89 Mbit/s

95th percentile per-packet one-way delay: 11.964 ms

Loss rate: 3.60%

### Run 6: Report of PCC — Data Link



Run 7: Statistics of PCC

Start at: 2018-02-27 09:55:12

End at: 2018-02-27 09:55:42

# Below is generated by plot.py at 2018-02-27 10:37:16

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 8.57 Mbit/s (71.4% utilization)

95th percentile per-packet one-way delay: 11.947 ms

Loss rate: 3.35%

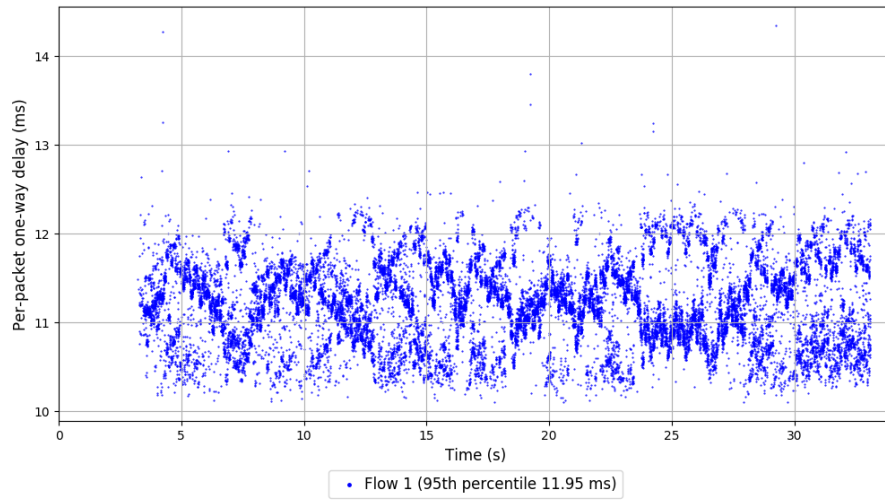
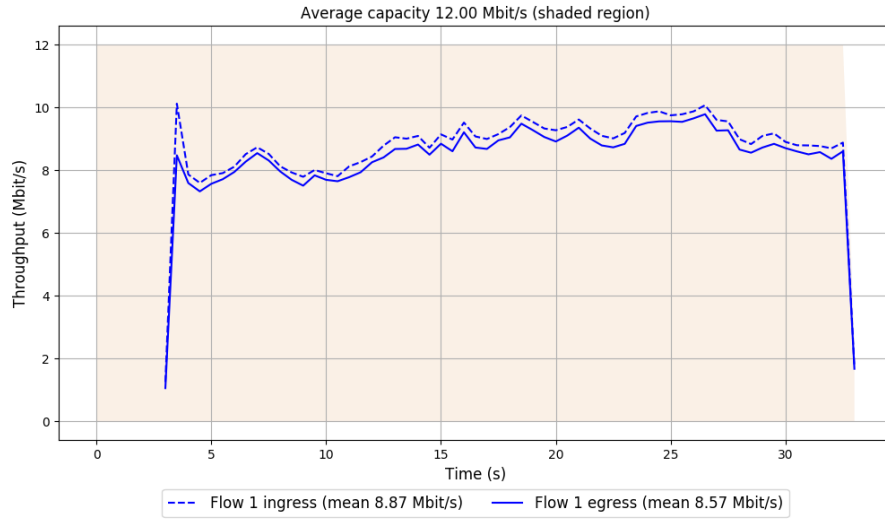
-- Flow 1:

Average throughput: 8.57 Mbit/s

95th percentile per-packet one-way delay: 11.947 ms

Loss rate: 3.35%

### Run 7: Report of PCC — Data Link



Run 8: Statistics of PCC

Start at: 2018-02-27 10:05:22

End at: 2018-02-27 10:05:52

# Below is generated by plot.py at 2018-02-27 10:37:16

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 8.74 Mbit/s (72.8% utilization)

95th percentile per-packet one-way delay: 12.039 ms

Loss rate: 3.49%

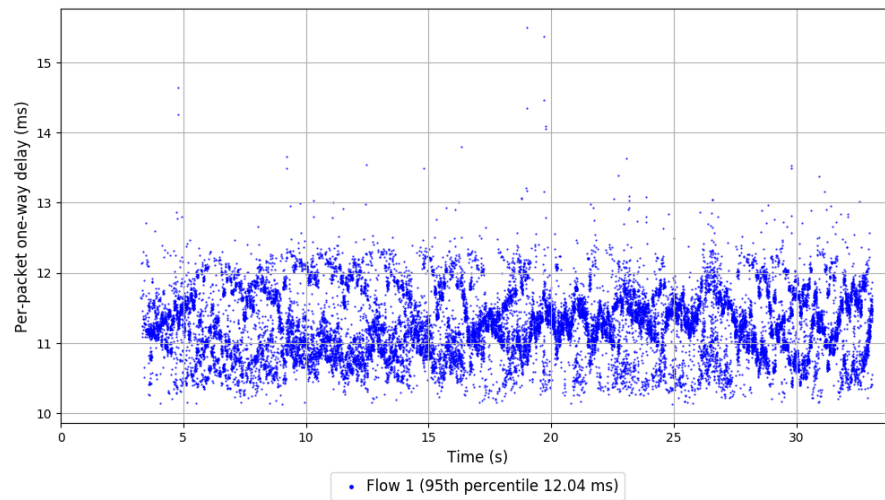
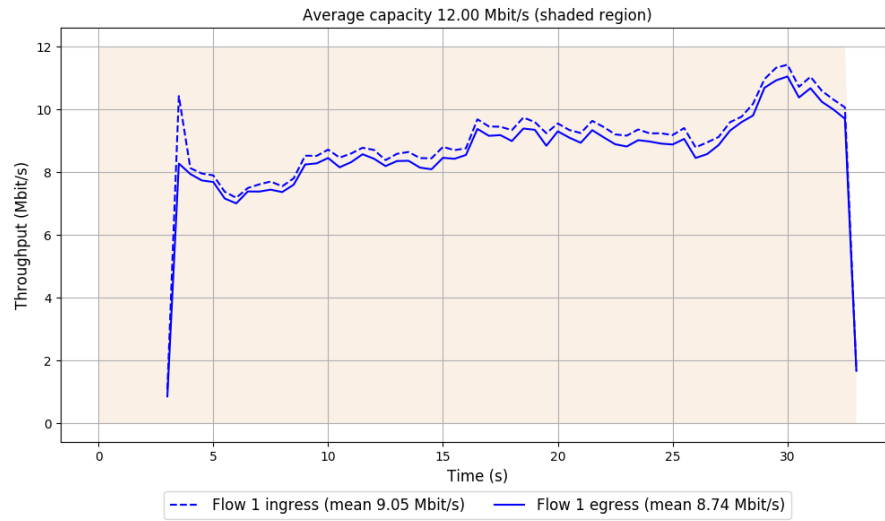
-- Flow 1:

Average throughput: 8.74 Mbit/s

95th percentile per-packet one-way delay: 12.039 ms

Loss rate: 3.49%

## Run 8: Report of PCC — Data Link



Run 9: Statistics of PCC

Start at: 2018-02-27 10:15:38

End at: 2018-02-27 10:16:08

# Below is generated by plot.py at 2018-02-27 10:37:21

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 8.34 Mbit/s (69.5% utilization)

95th percentile per-packet one-way delay: 11.944 ms

Loss rate: 3.60%

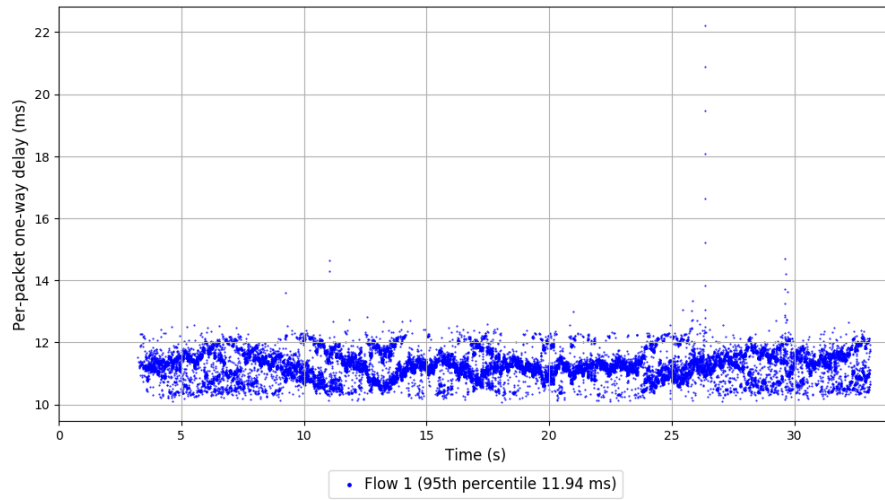
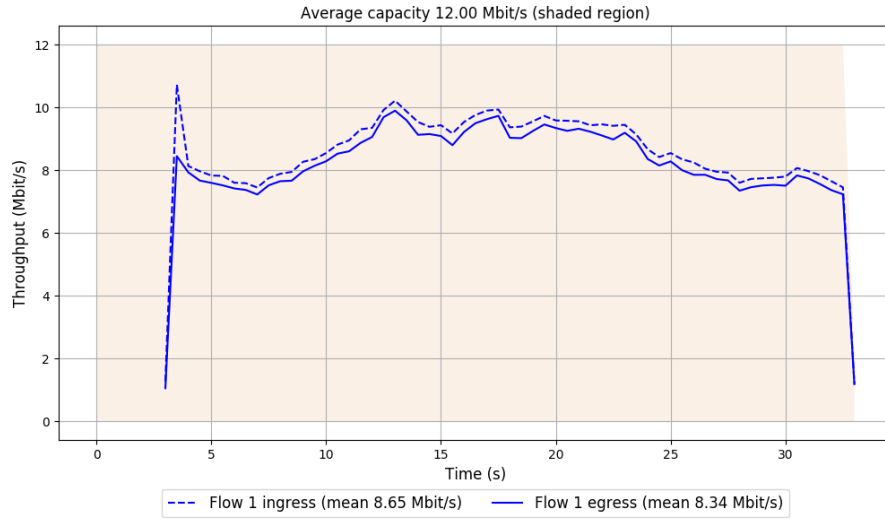
-- Flow 1:

Average throughput: 8.34 Mbit/s

95th percentile per-packet one-way delay: 11.944 ms

Loss rate: 3.60%

### Run 9: Report of PCC — Data Link



Run 10: Statistics of PCC

Start at: 2018-02-27 10:25:49

End at: 2018-02-27 10:26:19

# Below is generated by plot.py at 2018-02-27 10:37:22

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 3.77 Mbit/s (31.4% utilization)

95th percentile per-packet one-way delay: 12.024 ms

Loss rate: 3.29%

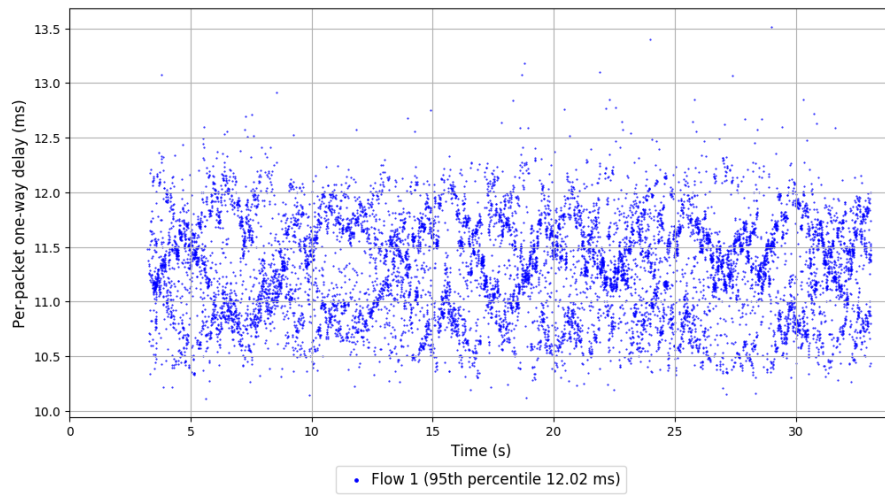
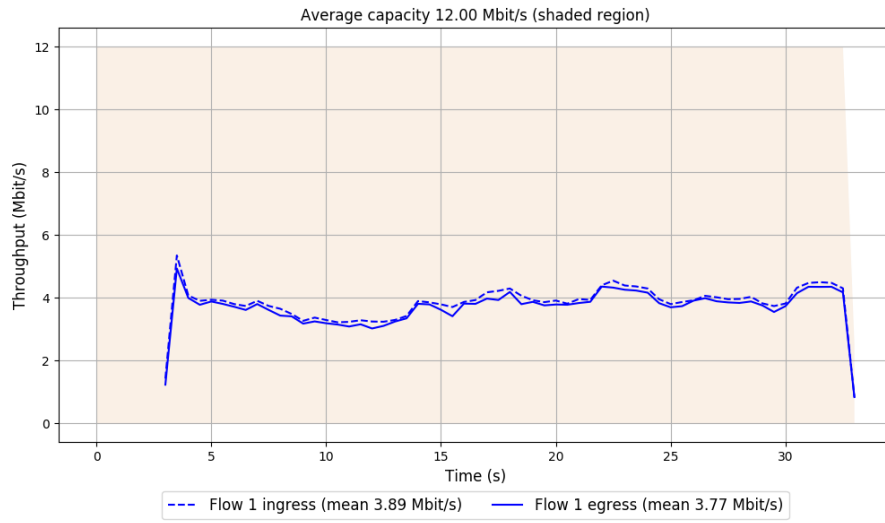
-- Flow 1:

Average throughput: 3.77 Mbit/s

95th percentile per-packet one-way delay: 12.024 ms

Loss rate: 3.29%

### Run 10: Report of PCC — Data Link



Run 1: Statistics of QUIC Cubic

Start at: 2018-02-27 08:57:55

End at: 2018-02-27 08:58:25

# Below is generated by plot.py at 2018-02-27 10:37:22

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 4.02 Mbit/s (33.5% utilization)

95th percentile per-packet one-way delay: 12.002 ms

Loss rate: 8.05%

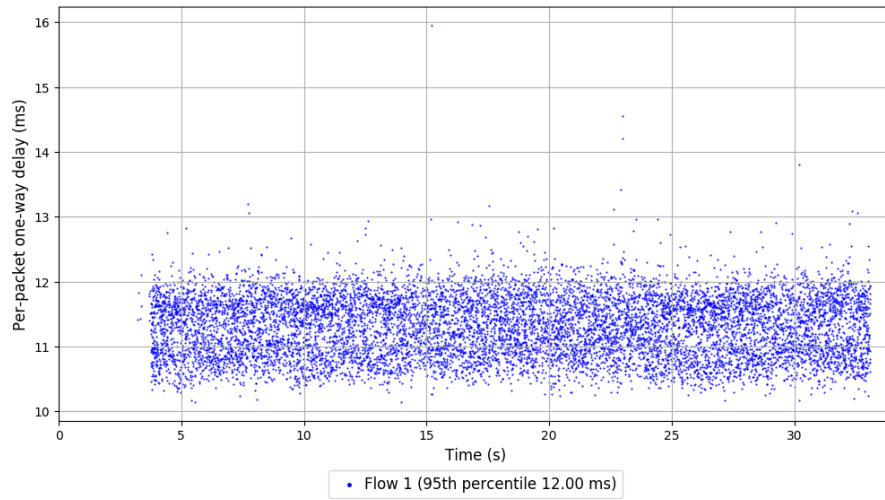
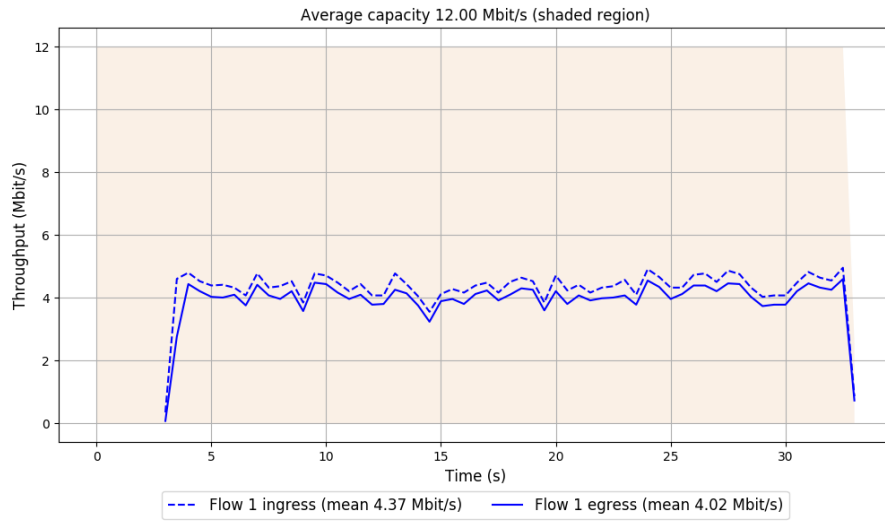
-- Flow 1:

Average throughput: 4.02 Mbit/s

95th percentile per-packet one-way delay: 12.002 ms

Loss rate: 8.05%

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



Run 2: Statistics of QUIC Cubic

Start at: 2018-02-27 09:08:06

End at: 2018-02-27 09:08:36

# Below is generated by plot.py at 2018-02-27 10:37:25

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 4.06 Mbit/s (33.8% utilization)

95th percentile per-packet one-way delay: 12.016 ms

Loss rate: 8.22%

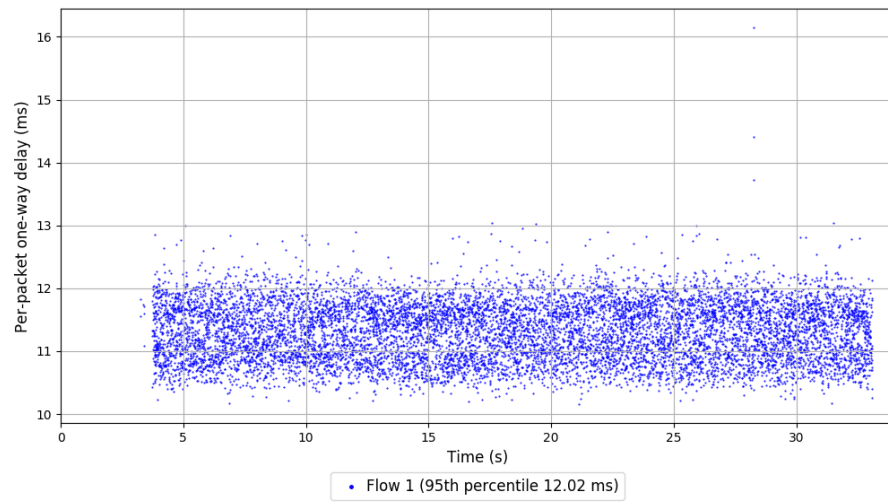
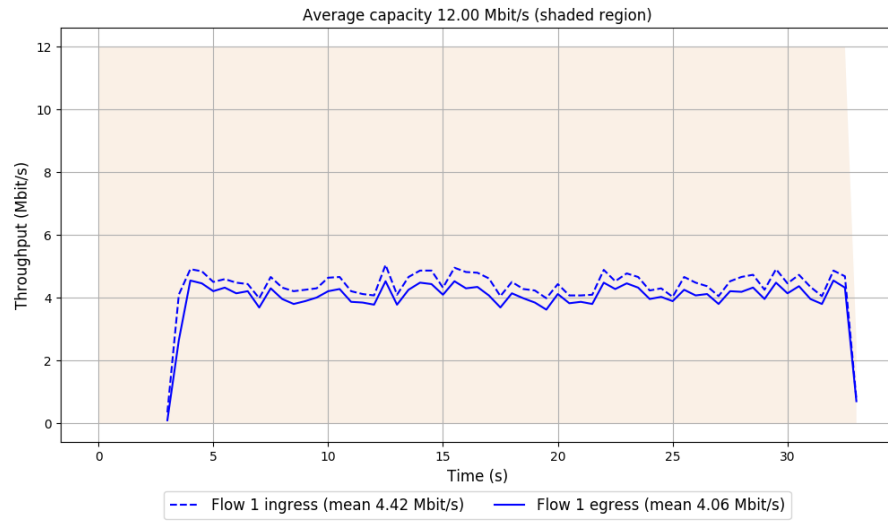
-- Flow 1:

Average throughput: 4.06 Mbit/s

95th percentile per-packet one-way delay: 12.016 ms

Loss rate: 8.22%

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



Run 3: Statistics of QUIC Cubic

Start at: 2018-02-27 09:18:17

End at: 2018-02-27 09:18:47

# Below is generated by plot.py at 2018-02-27 10:37:28

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 4.06 Mbit/s (33.8% utilization)

95th percentile per-packet one-way delay: 11.991 ms

Loss rate: 8.14%

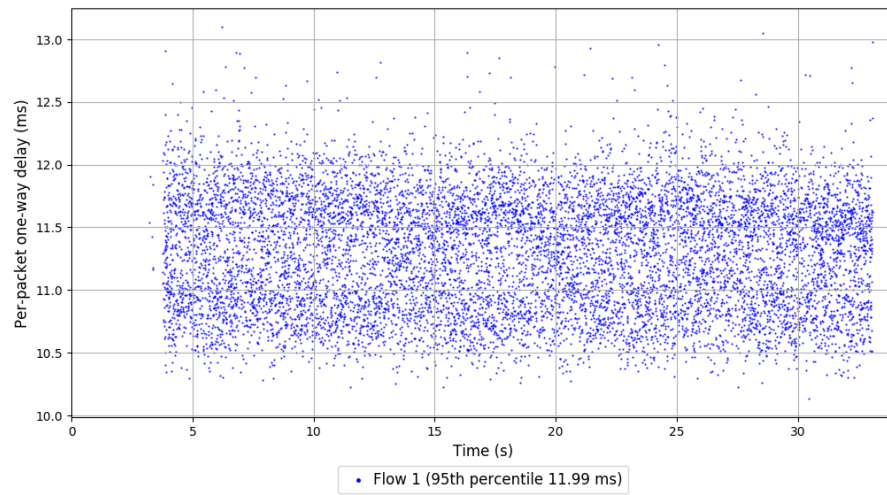
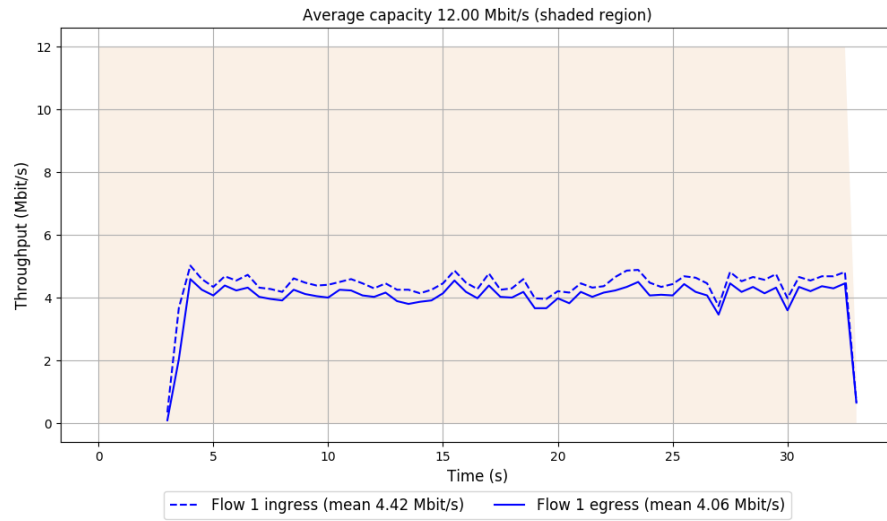
-- Flow 1:

Average throughput: 4.06 Mbit/s

95th percentile per-packet one-way delay: 11.991 ms

Loss rate: 8.14%

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



Run 4: Statistics of QUIC Cubic

Start at: 2018-02-27 09:28:32

End at: 2018-02-27 09:29:02

# Below is generated by plot.py at 2018-02-27 10:37:29

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 4.15 Mbit/s (34.6% utilization)

95th percentile per-packet one-way delay: 11.961 ms

Loss rate: 8.33%

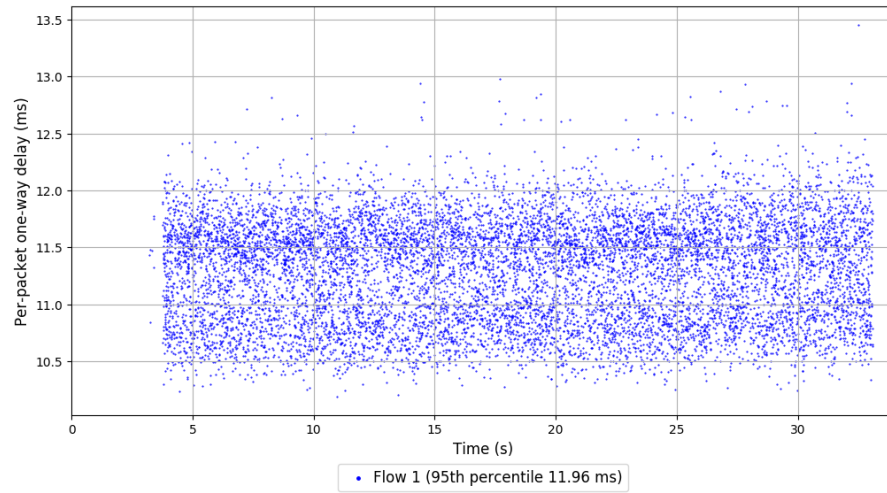
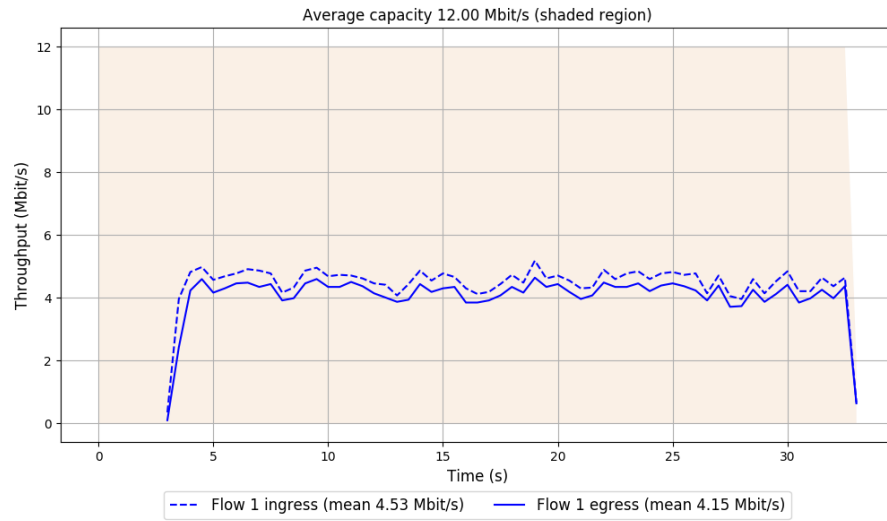
-- Flow 1:

Average throughput: 4.15 Mbit/s

95th percentile per-packet one-way delay: 11.961 ms

Loss rate: 8.33%

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



Run 5: Statistics of QUIC Cubic

Start at: 2018-02-27 09:38:47

End at: 2018-02-27 09:39:17

# Below is generated by plot.py at 2018-02-27 10:37:29

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 4.02 Mbit/s (33.5% utilization)

95th percentile per-packet one-way delay: 12.015 ms

Loss rate: 8.42%

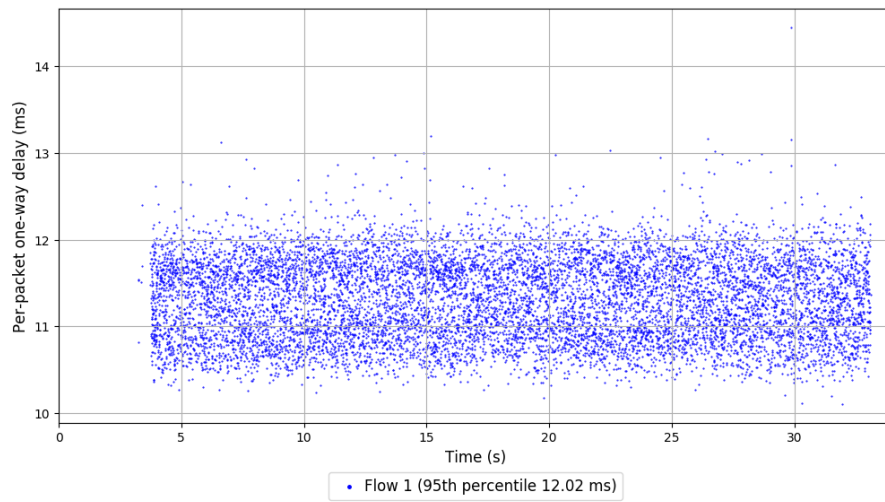
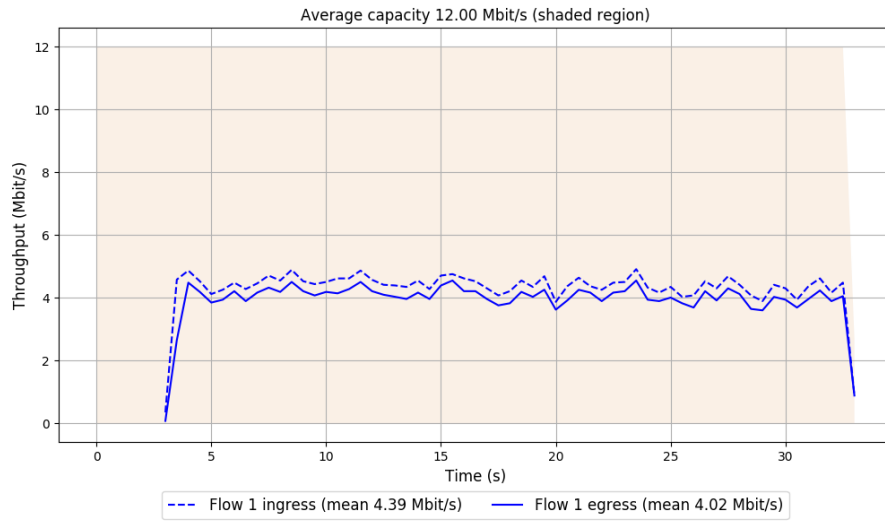
-- Flow 1:

Average throughput: 4.02 Mbit/s

95th percentile per-packet one-way delay: 12.015 ms

Loss rate: 8.42%

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



Run 6: Statistics of QUIC Cubic

Start at: 2018-02-27 09:48:59

End at: 2018-02-27 09:49:29

# Below is generated by plot.py at 2018-02-27 10:37:30

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 4.19 Mbit/s (34.9% utilization)

95th percentile per-packet one-way delay: 11.894 ms

Loss rate: 7.84%

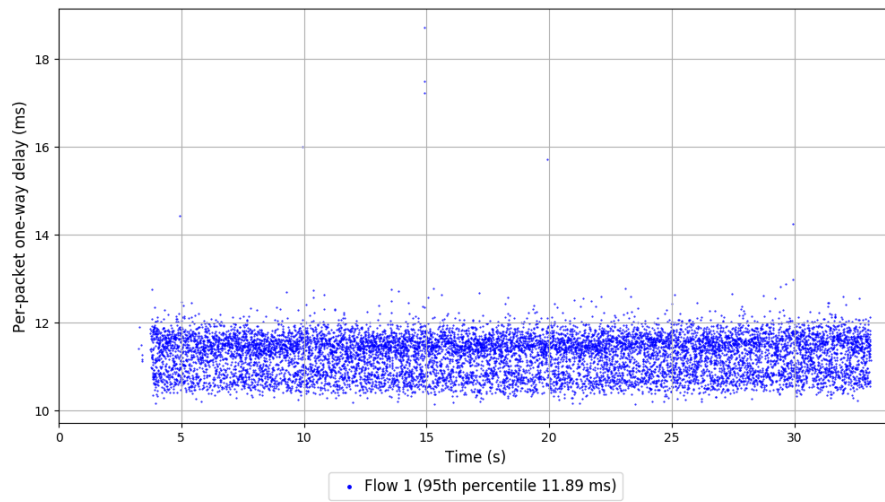
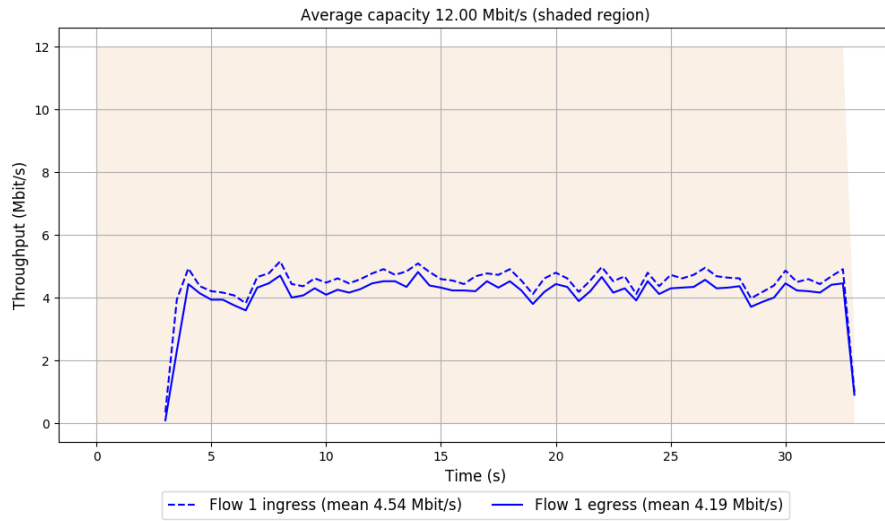
-- Flow 1:

Average throughput: 4.19 Mbit/s

95th percentile per-packet one-way delay: 11.894 ms

Loss rate: 7.84%

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



Run 7: Statistics of QUIC Cubic

Start at: 2018-02-27 09:59:10

End at: 2018-02-27 09:59:40

# Below is generated by plot.py at 2018-02-27 10:37:35

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 4.12 Mbit/s (34.3% utilization)

95th percentile per-packet one-way delay: 11.971 ms

Loss rate: 8.56%

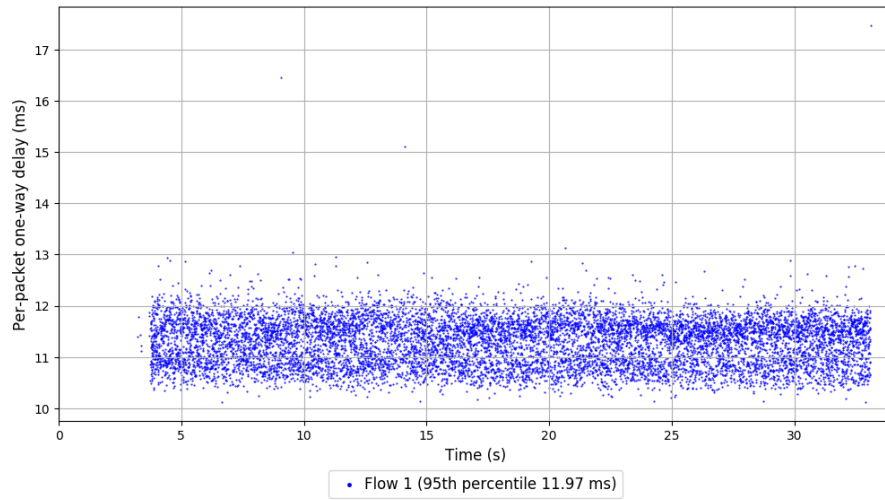
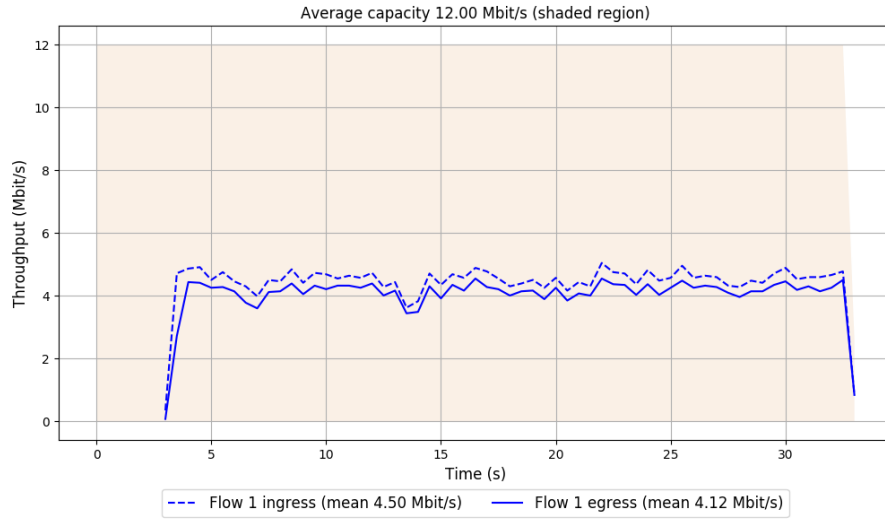
-- Flow 1:

Average throughput: 4.12 Mbit/s

95th percentile per-packet one-way delay: 11.971 ms

Loss rate: 8.56%

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



Run 8: Statistics of QUIC Cubic

Start at: 2018-02-27 10:09:21

End at: 2018-02-27 10:09:51

# Below is generated by plot.py at 2018-02-27 10:37:38

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 4.08 Mbit/s (34.0% utilization)

95th percentile per-packet one-way delay: 11.980 ms

Loss rate: 8.44%

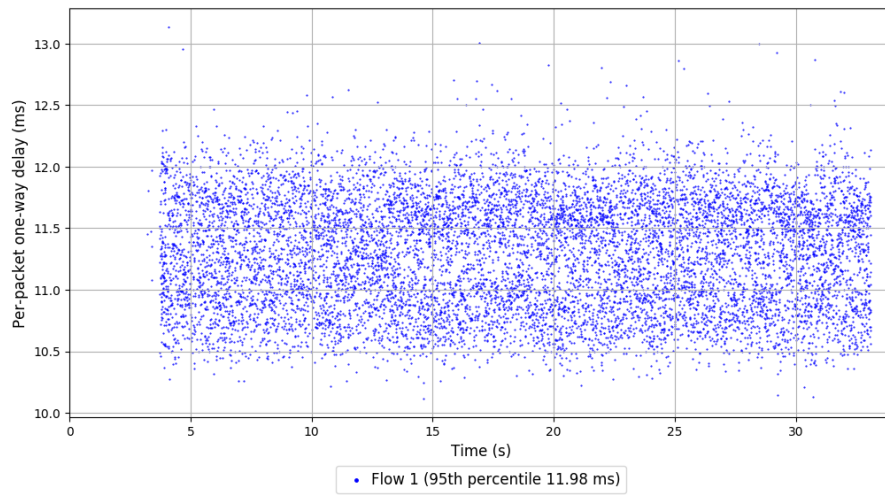
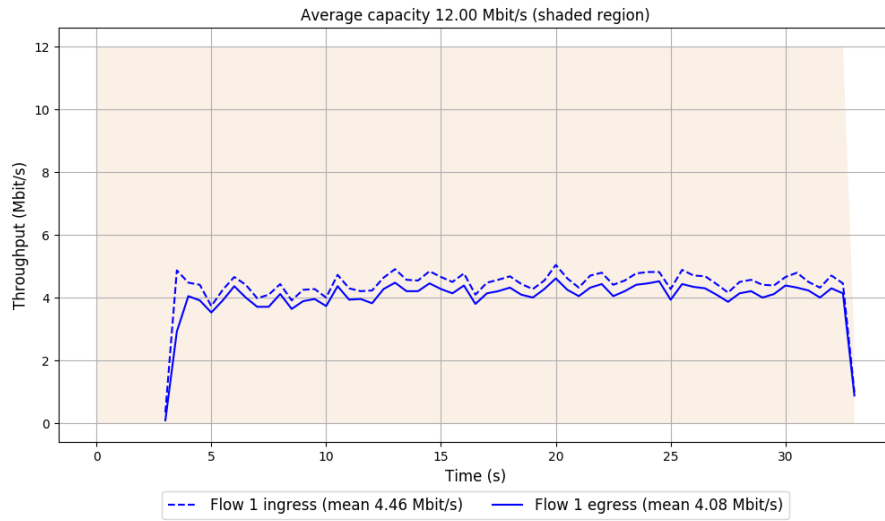
-- Flow 1:

Average throughput: 4.08 Mbit/s

95th percentile per-packet one-way delay: 11.980 ms

Loss rate: 8.44%

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



Run 9: Statistics of QUIC Cubic

Start at: 2018-02-27 10:19:36

End at: 2018-02-27 10:20:06

# Below is generated by plot.py at 2018-02-27 10:37:39

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 4.05 Mbit/s (33.7% utilization)

95th percentile per-packet one-way delay: 12.073 ms

Loss rate: 8.07%

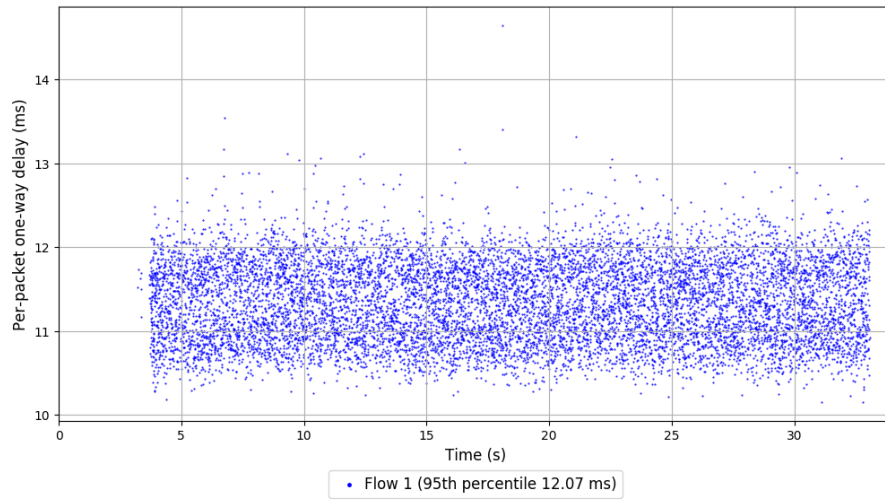
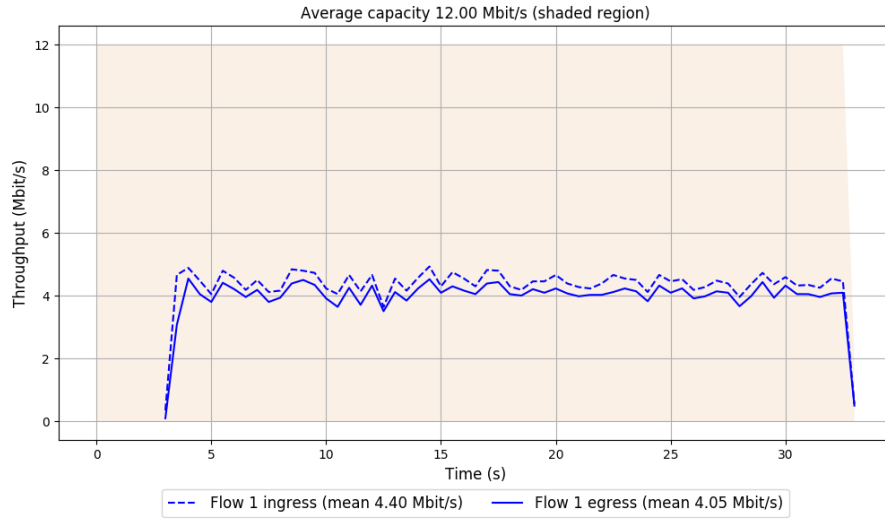
-- Flow 1:

Average throughput: 4.05 Mbit/s

95th percentile per-packet one-way delay: 12.073 ms

Loss rate: 8.07%

### Run 9: Report of QUIC Cubic — Data Link



Run 10: Statistics of QUIC Cubic

Start at: 2018-02-27 10:29:47

End at: 2018-02-27 10:30:17

# Below is generated by plot.py at 2018-02-27 10:37:41

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 4.07 Mbit/s (33.9% utilization)

95th percentile per-packet one-way delay: 12.046 ms

Loss rate: 8.18%

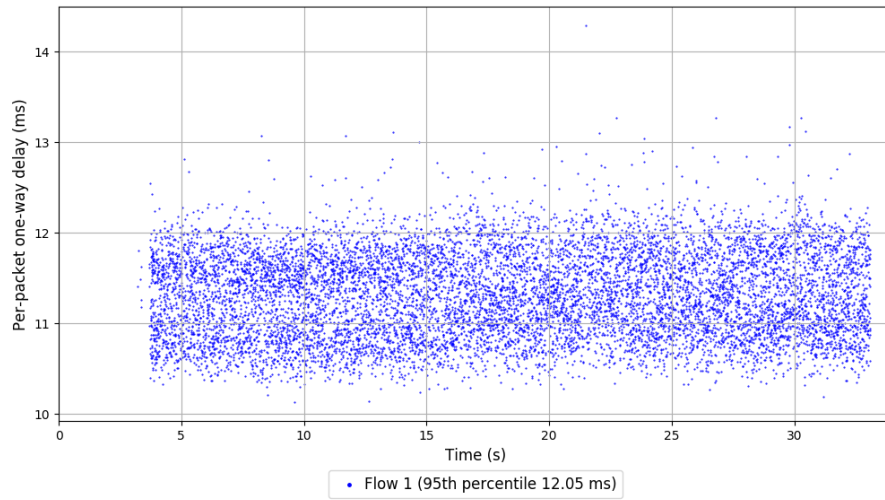
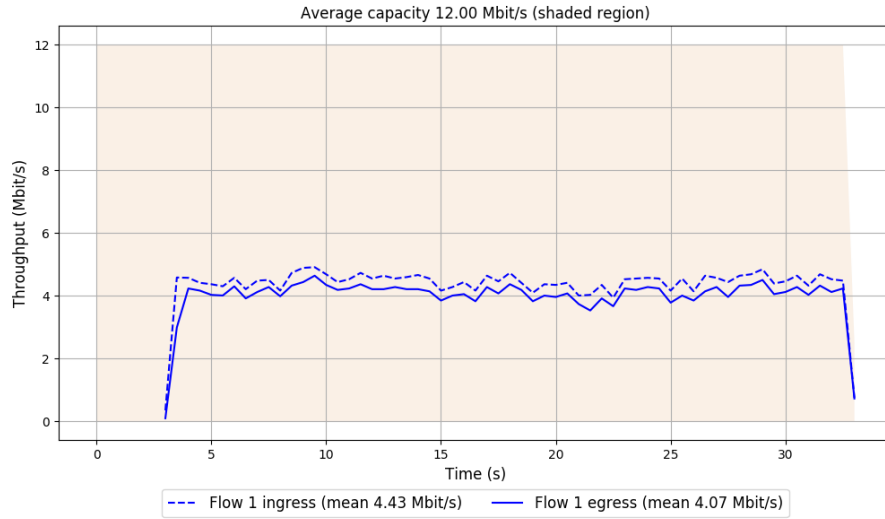
-- Flow 1:

Average throughput: 4.07 Mbit/s

95th percentile per-packet one-way delay: 12.046 ms

Loss rate: 8.18%

### Run 10: Report of QUIC Cubic — Data Link



Run 1: Statistics of SCReAM

Start at: 2018-02-27 09:00:10

End at: 2018-02-27 09:00:40

# Below is generated by plot.py at 2018-02-27 10:37:41

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.21 Mbit/s (1.8% utilization)

95th percentile per-packet one-way delay: 11.522 ms

Loss rate: 0.00%

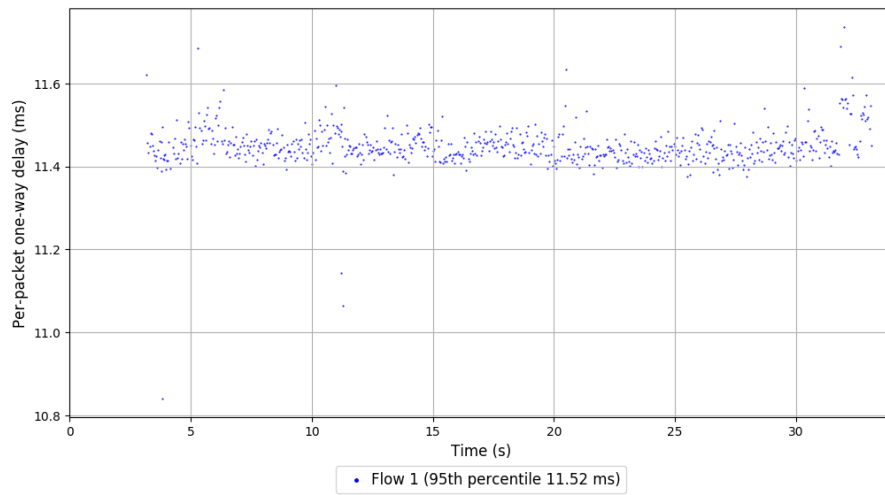
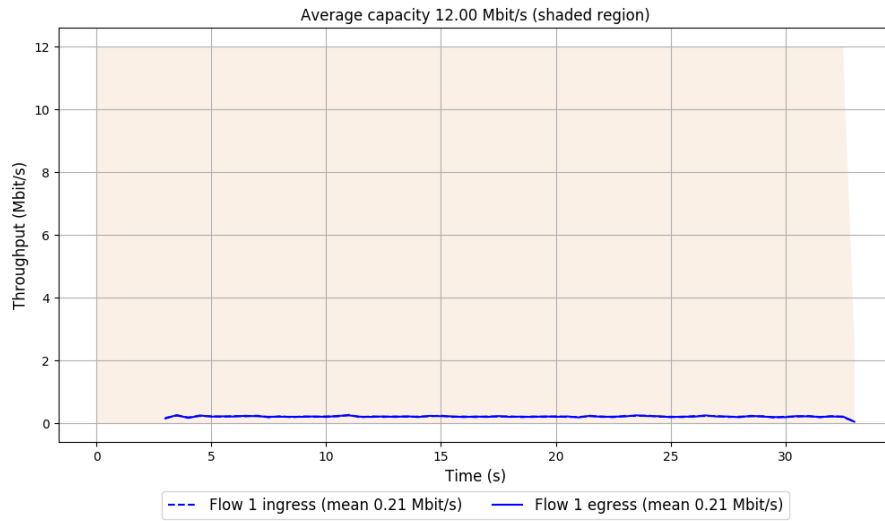
-- Flow 1:

Average throughput: 0.21 Mbit/s

95th percentile per-packet one-way delay: 11.522 ms

Loss rate: 0.00%

# Run 1: Report of SCReAM — Data Link



Run 2: Statistics of SCReAM

Start at: 2018-02-27 09:10:21

End at: 2018-02-27 09:10:51

# Below is generated by plot.py at 2018-02-27 10:37:41

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.21 Mbit/s (1.8% utilization)

95th percentile per-packet one-way delay: 11.546 ms

Loss rate: 0.00%

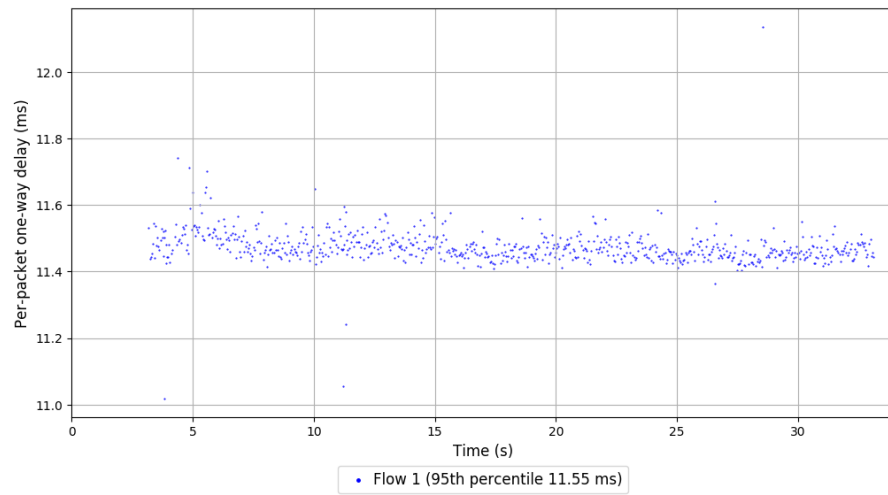
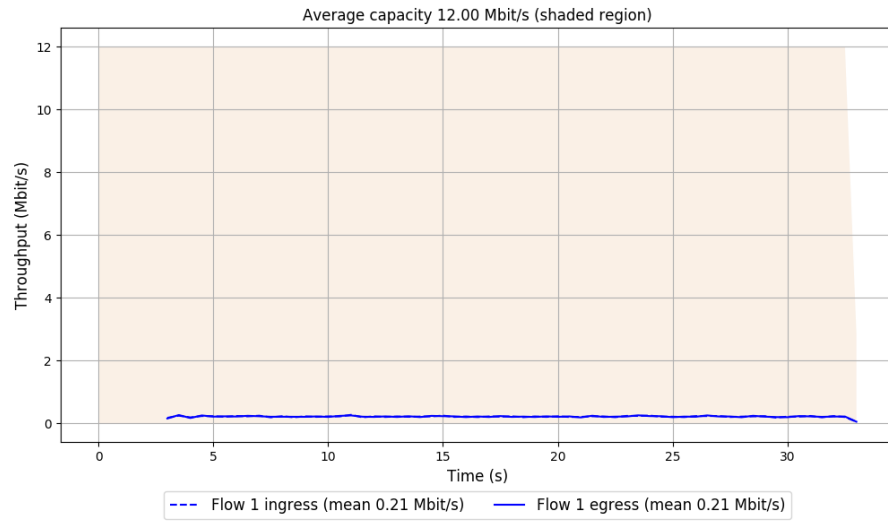
-- Flow 1:

Average throughput: 0.21 Mbit/s

95th percentile per-packet one-way delay: 11.546 ms

Loss rate: 0.00%

## Run 2: Report of SCReAM — Data Link



Run 3: Statistics of SCReAM

Start at: 2018-02-27 09:20:32

End at: 2018-02-27 09:21:02

# Below is generated by plot.py at 2018-02-27 10:37:41

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.21 Mbit/s (1.8% utilization)

95th percentile per-packet one-way delay: 11.700 ms

Loss rate: 0.00%

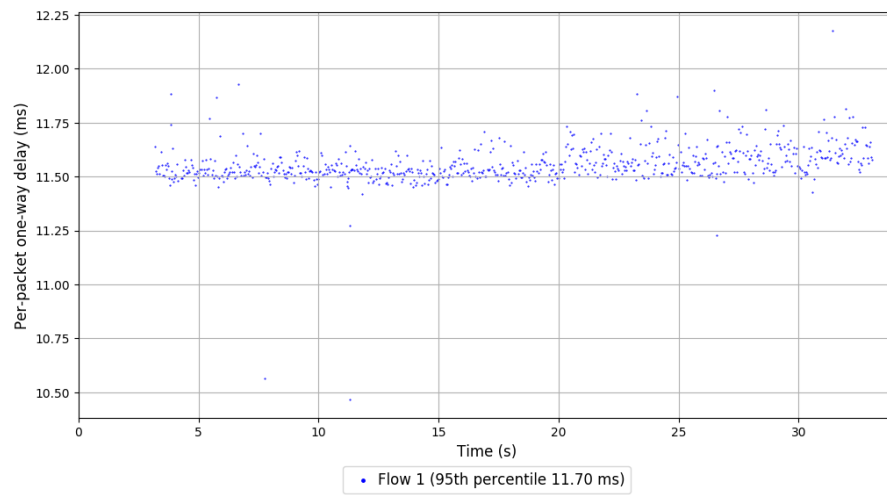
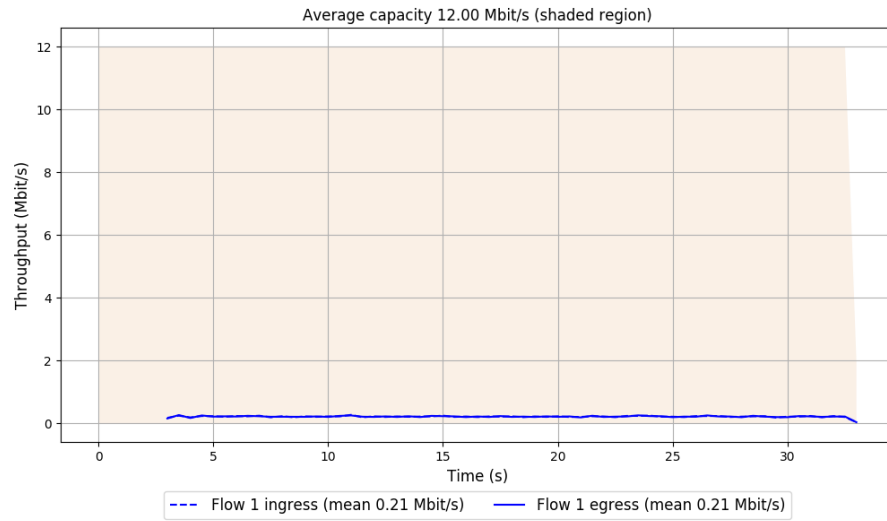
-- Flow 1:

Average throughput: 0.21 Mbit/s

95th percentile per-packet one-way delay: 11.700 ms

Loss rate: 0.00%

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



Run 4: Statistics of SCReAM

Start at: 2018-02-27 09:30:47

End at: 2018-02-27 09:31:17

# Below is generated by plot.py at 2018-02-27 10:37:41

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.21 Mbit/s (1.8% utilization)

95th percentile per-packet one-way delay: 11.568 ms

Loss rate: 0.00%

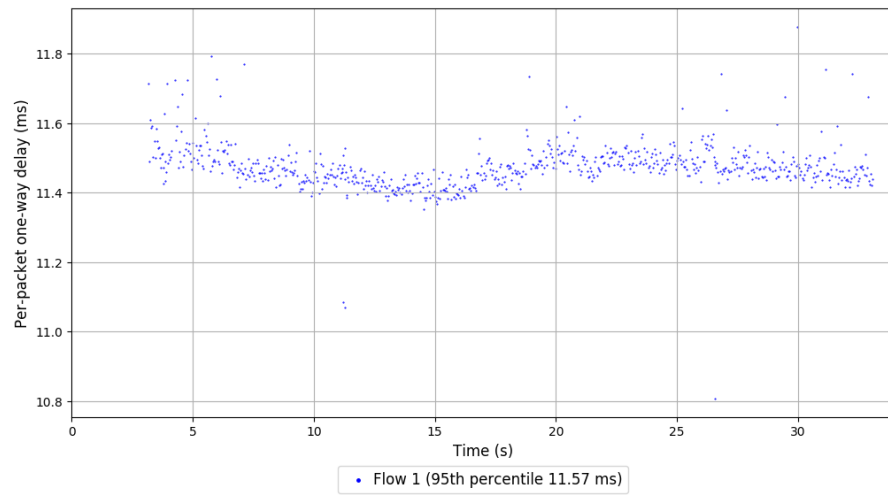
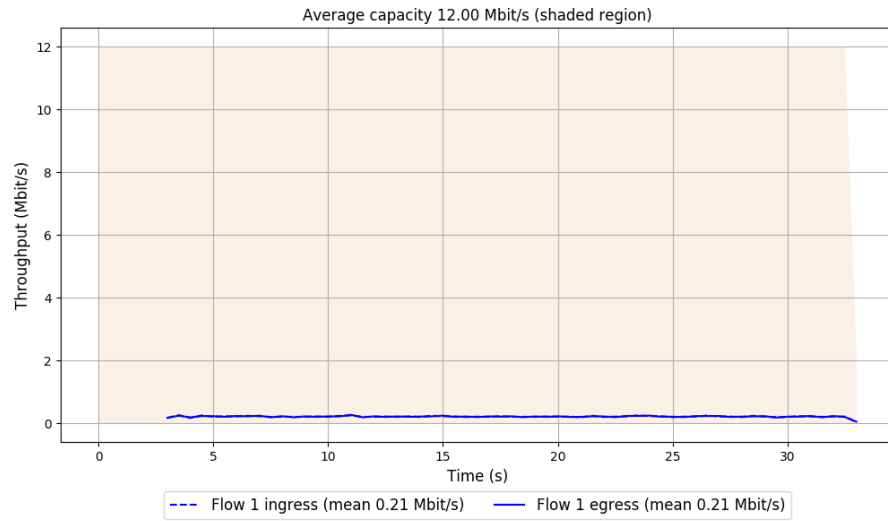
-- Flow 1:

Average throughput: 0.21 Mbit/s

95th percentile per-packet one-way delay: 11.568 ms

Loss rate: 0.00%

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



Run 5: Statistics of SCReAM

Start at: 2018-02-27 09:41:02

End at: 2018-02-27 09:41:32

# Below is generated by plot.py at 2018-02-27 10:37:43

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.21 Mbit/s (1.8% utilization)

95th percentile per-packet one-way delay: 11.526 ms

Loss rate: 0.13%

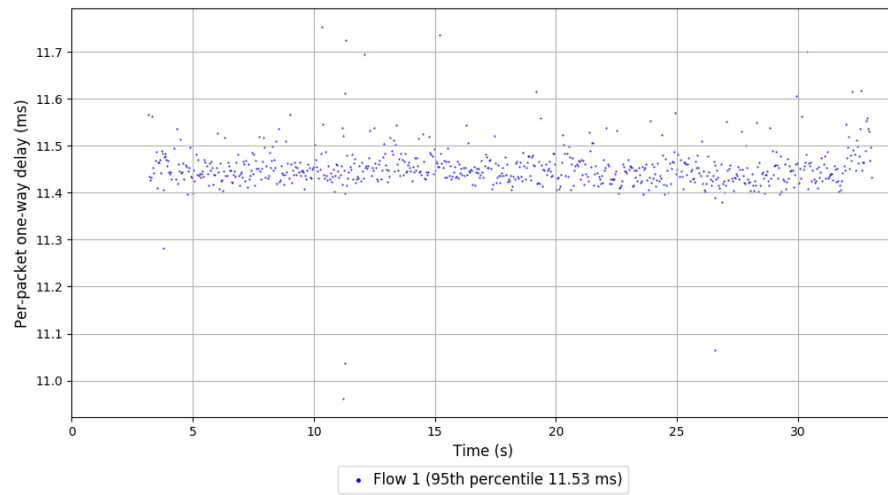
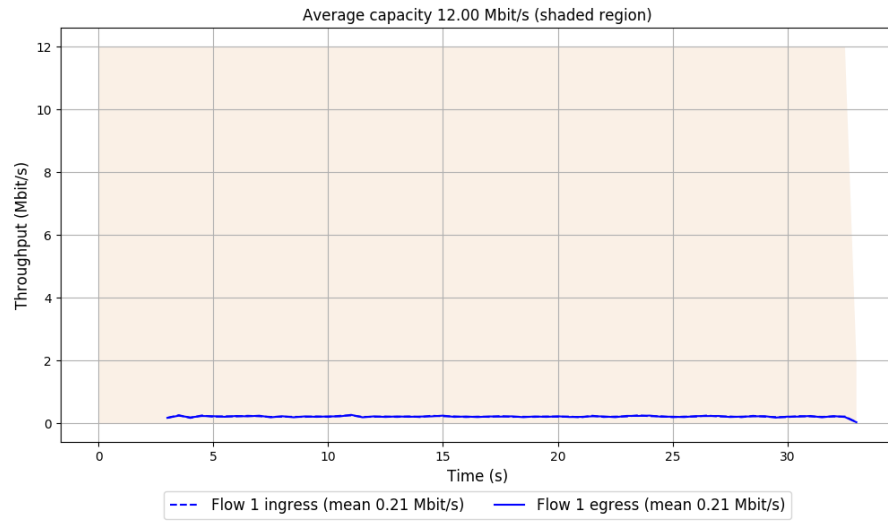
-- Flow 1:

Average throughput: 0.21 Mbit/s

95th percentile per-packet one-way delay: 11.526 ms

Loss rate: 0.13%

## Run 5: Report of SCReAM — Data Link



Run 6: Statistics of SCReAM

Start at: 2018-02-27 09:51:14

End at: 2018-02-27 09:51:44

# Below is generated by plot.py at 2018-02-27 10:37:43

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.21 Mbit/s (1.8% utilization)

95th percentile per-packet one-way delay: 11.608 ms

Loss rate: 0.00%

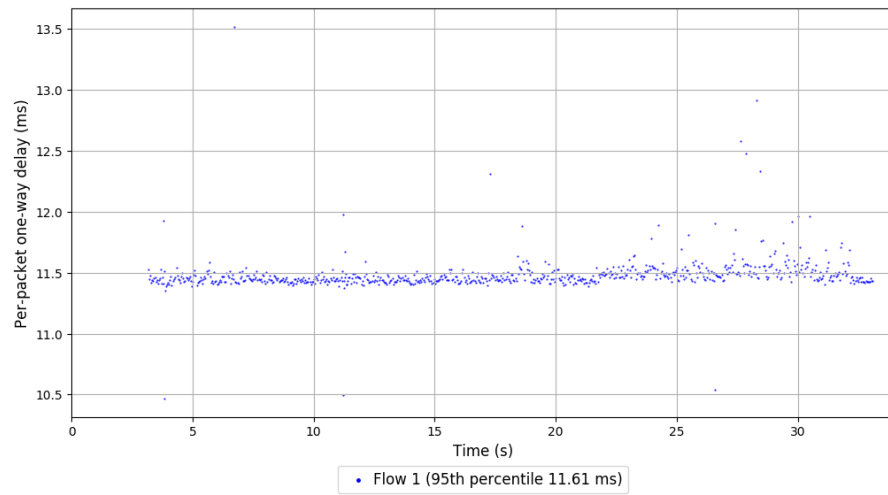
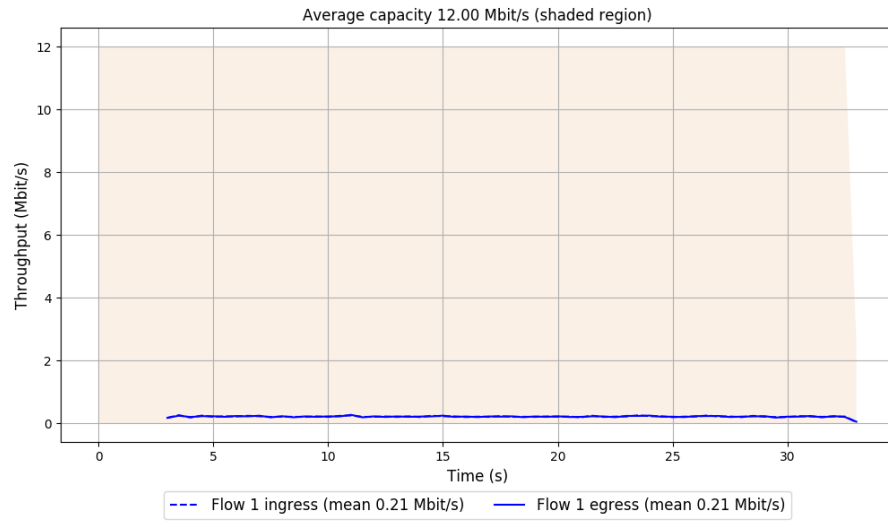
-- Flow 1:

Average throughput: 0.21 Mbit/s

95th percentile per-packet one-way delay: 11.608 ms

Loss rate: 0.00%

## Run 6: Report of SCReAM — Data Link



Run 7: Statistics of SCReAM

Start at: 2018-02-27 10:01:25

End at: 2018-02-27 10:01:55

# Below is generated by plot.py at 2018-02-27 10:37:46

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.21 Mbit/s (1.8% utilization)

95th percentile per-packet one-way delay: 11.658 ms

Loss rate: 0.00%

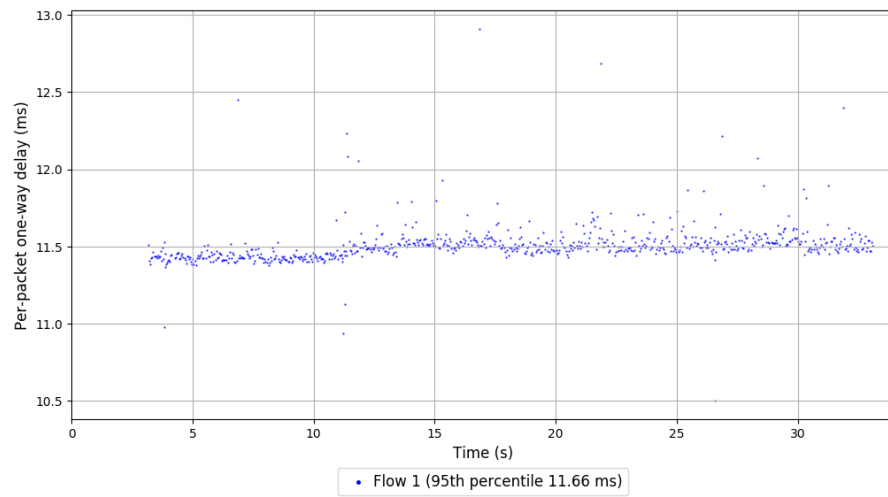
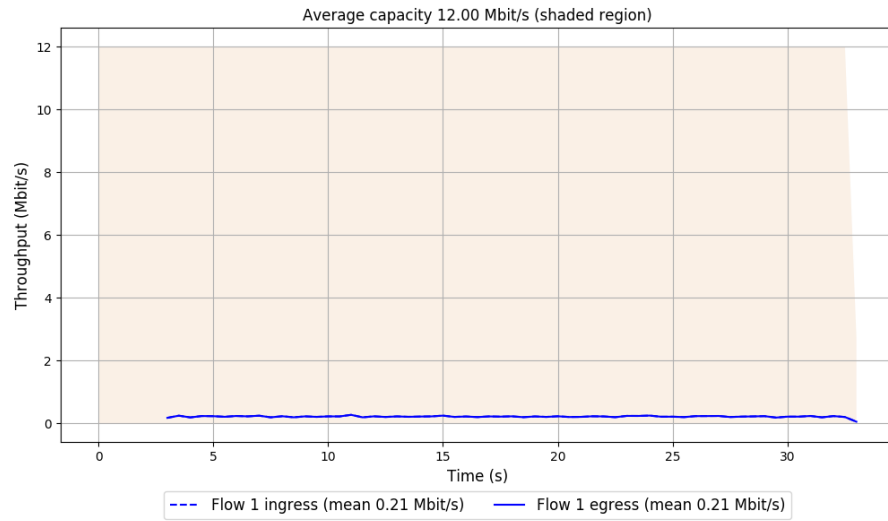
-- Flow 1:

Average throughput: 0.21 Mbit/s

95th percentile per-packet one-way delay: 11.658 ms

Loss rate: 0.00%

## Run 7: Report of SCReAM — Data Link



Run 8: Statistics of SCReAM

Start at: 2018-02-27 10:11:36

End at: 2018-02-27 10:12:06

# Below is generated by plot.py at 2018-02-27 10:37:47

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.21 Mbit/s (1.8% utilization)

95th percentile per-packet one-way delay: 11.813 ms

Loss rate: 0.13%

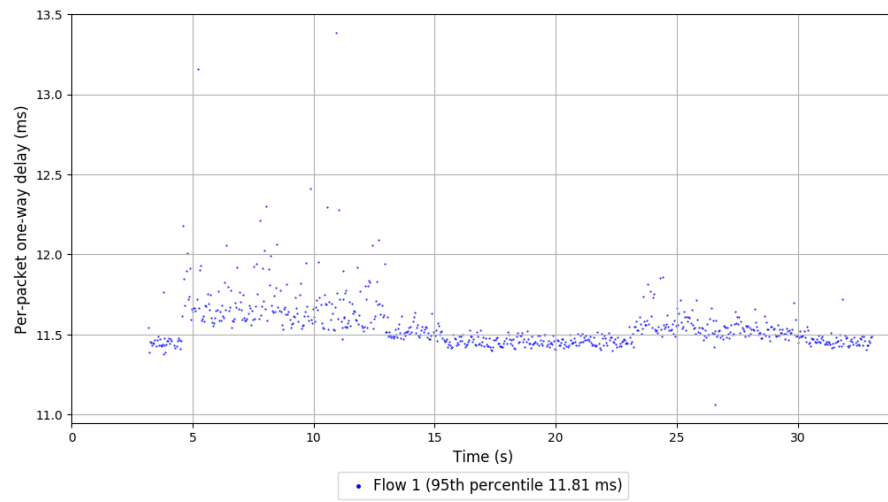
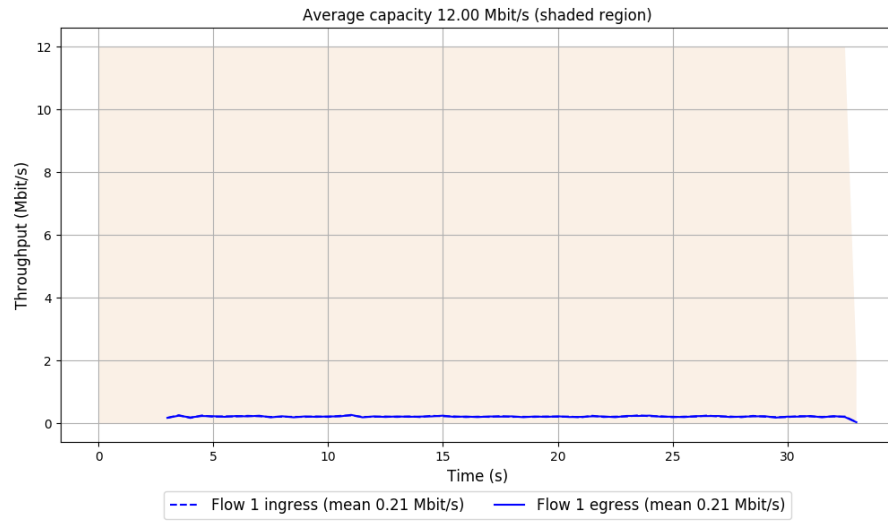
-- Flow 1:

Average throughput: 0.21 Mbit/s

95th percentile per-packet one-way delay: 11.813 ms

Loss rate: 0.13%

## Run 8: Report of SCReAM — Data Link



Run 9: Statistics of SCReAM

Start at: 2018-02-27 10:21:51

End at: 2018-02-27 10:22:21

# Below is generated by plot.py at 2018-02-27 10:37:47

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.21 Mbit/s (1.8% utilization)

95th percentile per-packet one-way delay: 11.937 ms

Loss rate: 0.00%

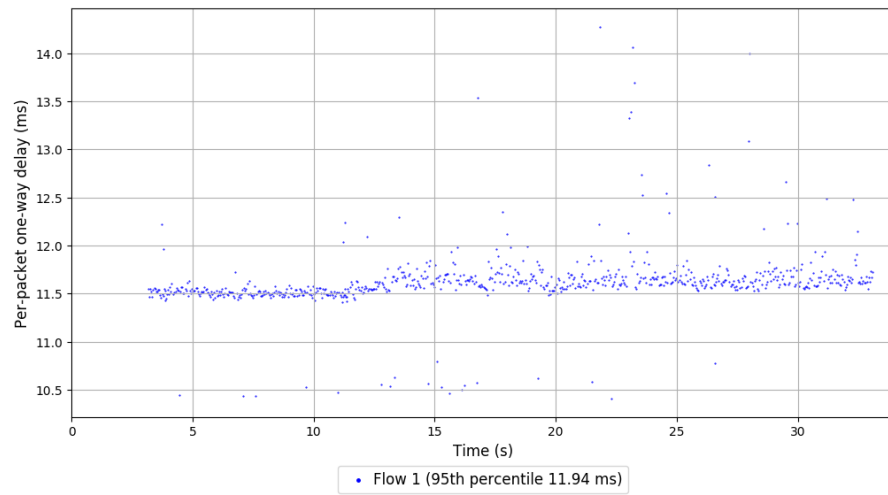
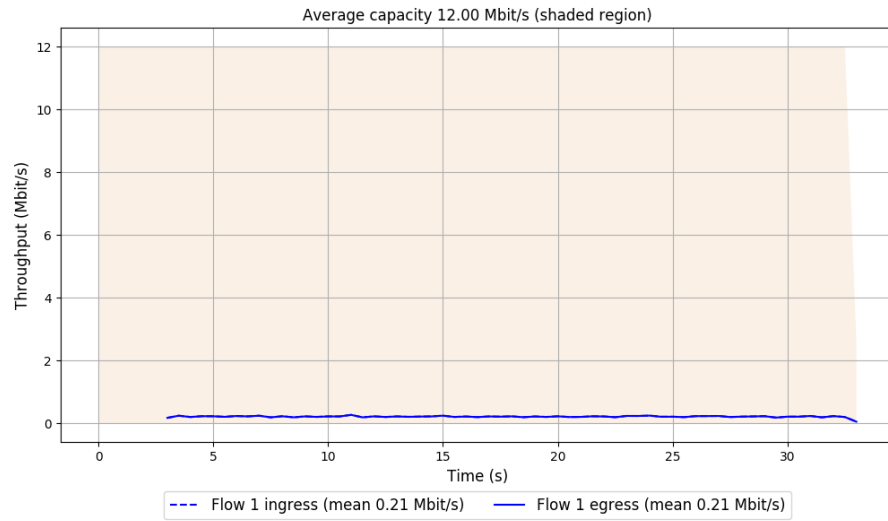
-- Flow 1:

Average throughput: 0.21 Mbit/s

95th percentile per-packet one-way delay: 11.937 ms

Loss rate: 0.00%

## Run 9: Report of SReAM — Data Link



Run 10: Statistics of SReAM

Start at: 2018-02-27 10:32:03

End at: 2018-02-27 10:32:33

# Below is generated by plot.py at 2018-02-27 10:37:47

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.21 Mbit/s (1.8% utilization)

95th percentile per-packet one-way delay: 11.777 ms

Loss rate: 0.00%

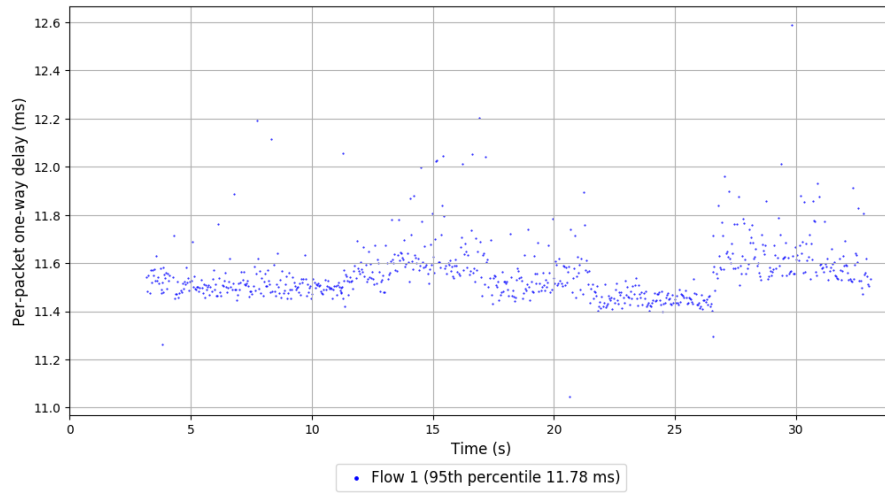
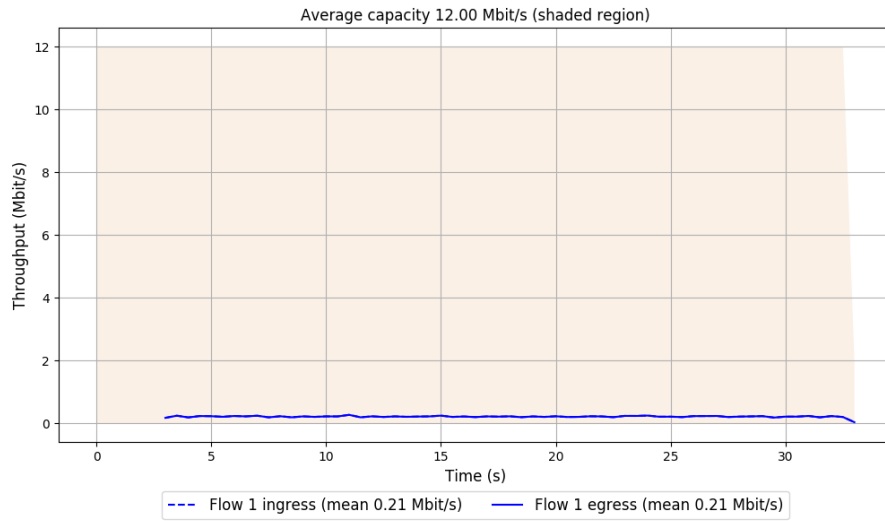
-- Flow 1:

Average throughput: 0.21 Mbit/s

95th percentile per-packet one-way delay: 11.777 ms

Loss rate: 0.00%

### Run 10: Report of SCReAM — Data Link



Run 1: Statistics of WebRTC media

Start at: 2018-02-27 08:58:29

End at: 2018-02-27 08:58:59

# Below is generated by plot.py at 2018-02-27 10:37:49

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.64 Mbit/s (5.4% utilization)

95th percentile per-packet one-way delay: 11.830 ms

Loss rate: 33.25%

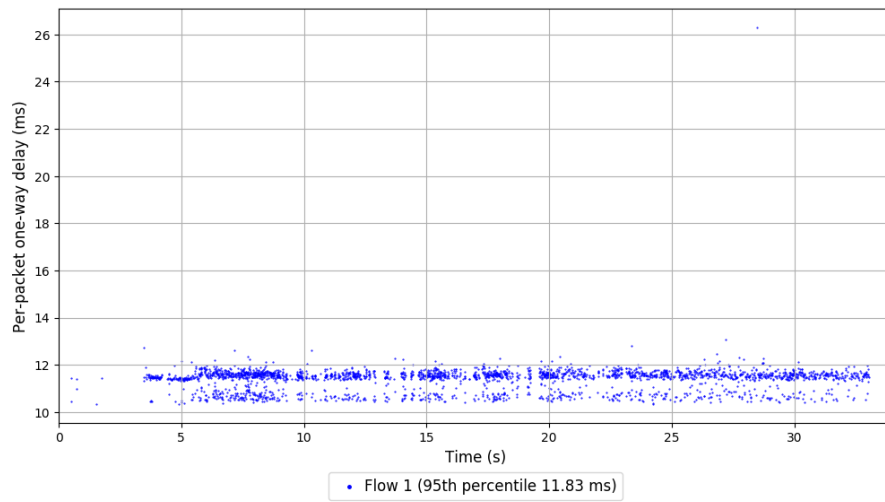
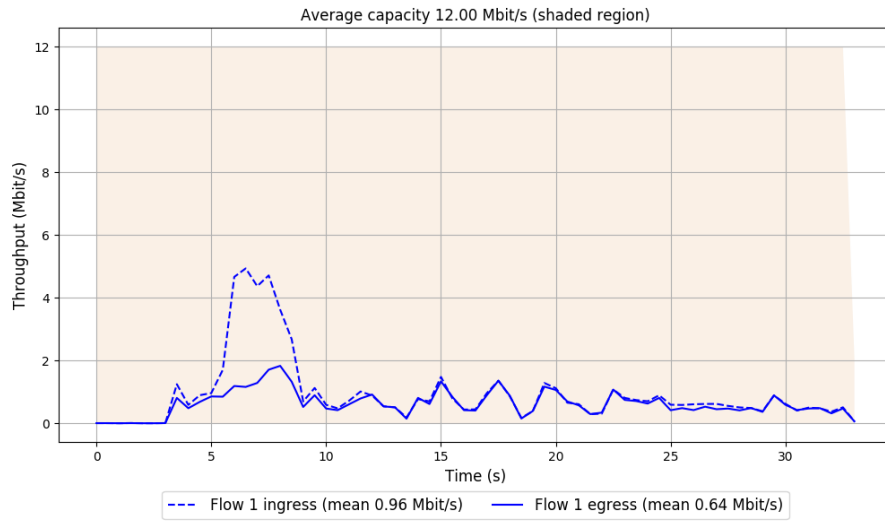
-- Flow 1:

Average throughput: 0.64 Mbit/s

95th percentile per-packet one-way delay: 11.830 ms

Loss rate: 33.25%

# Run 1: Report of WebRTC media — Data Link



Run 2: Statistics of WebRTC media

Start at: 2018-02-27 09:08:40

End at: 2018-02-27 09:09:10

# Below is generated by plot.py at 2018-02-27 10:37:50

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.69 Mbit/s (5.7% utilization)

95th percentile per-packet one-way delay: 11.908 ms

Loss rate: 39.55%

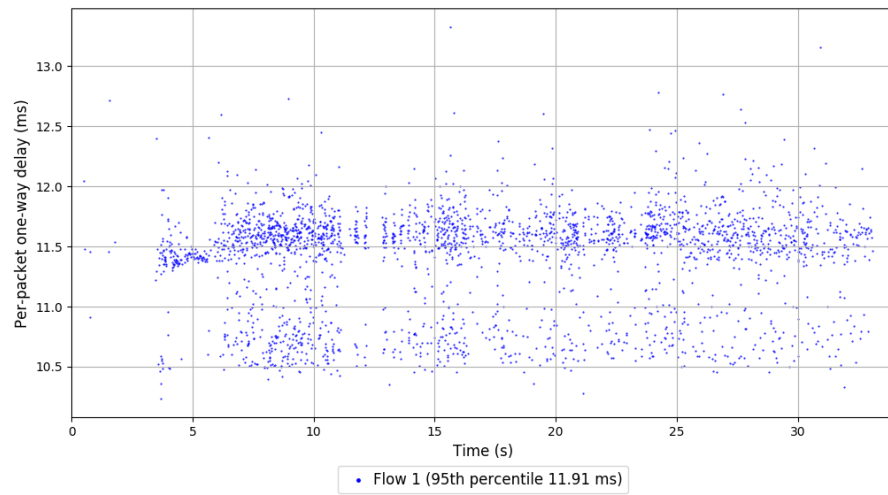
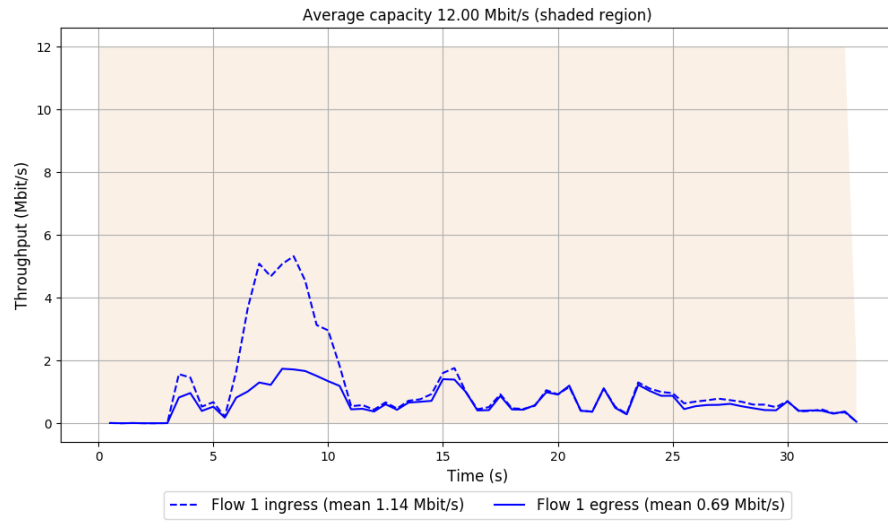
-- Flow 1:

Average throughput: 0.69 Mbit/s

95th percentile per-packet one-way delay: 11.908 ms

Loss rate: 39.55%

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



Run 3: Statistics of WebRTC media

Start at: 2018-02-27 09:18:51

End at: 2018-02-27 09:19:21

# Below is generated by plot.py at 2018-02-27 10:37:53

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.63 Mbit/s (5.3% utilization)

95th percentile per-packet one-way delay: 11.837 ms

Loss rate: 40.35%

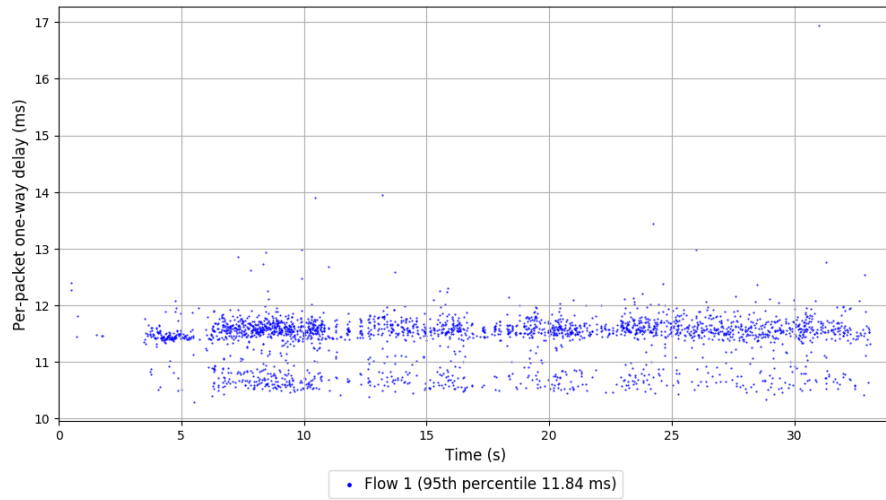
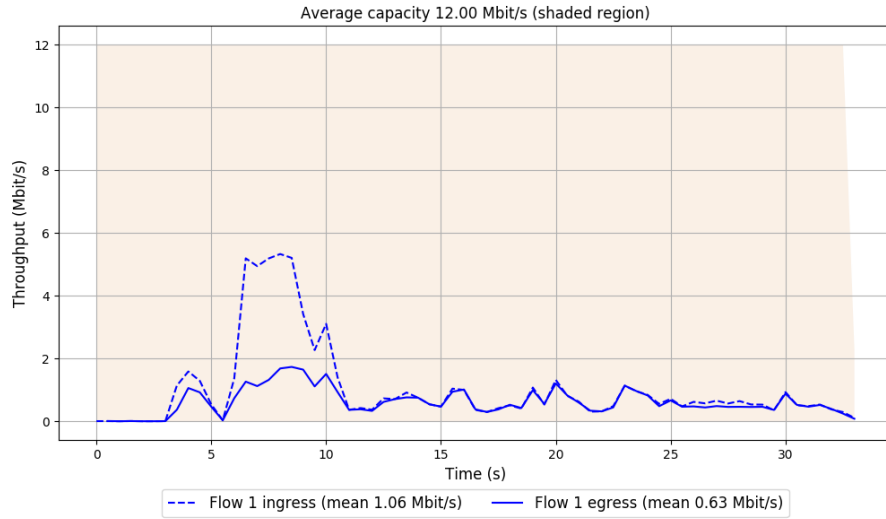
-- Flow 1:

Average throughput: 0.63 Mbit/s

95th percentile per-packet one-way delay: 11.837 ms

Loss rate: 40.35%

### Run 3: Report of WebRTC media — Data Link



Run 4: Statistics of WebRTC media

Start at: 2018-02-27 09:29:06

End at: 2018-02-27 09:29:36

# Below is generated by plot.py at 2018-02-27 10:37:53

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.68 Mbit/s (5.7% utilization)

95th percentile per-packet one-way delay: 11.878 ms

Loss rate: 37.04%

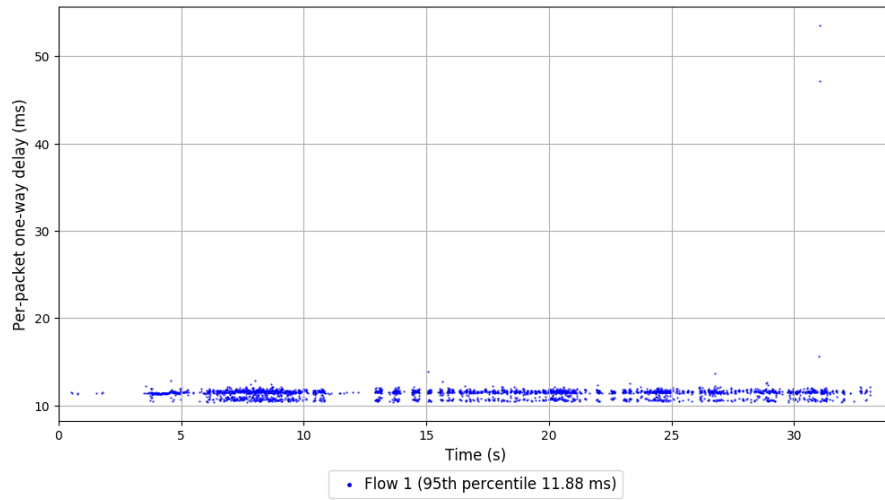
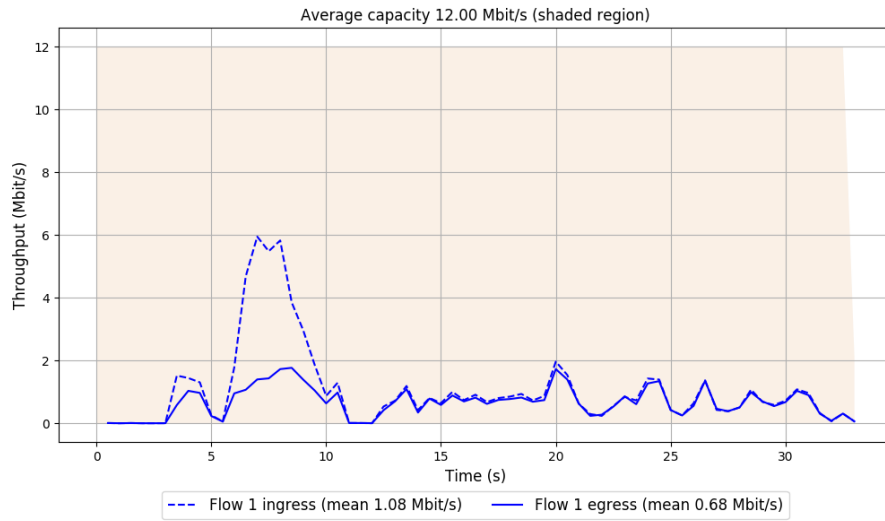
-- Flow 1:

Average throughput: 0.68 Mbit/s

95th percentile per-packet one-way delay: 11.878 ms

Loss rate: 37.04%

### Run 4: Report of WebRTC media — Data Link



Run 5: Statistics of WebRTC media

Start at: 2018-02-27 09:39:21

End at: 2018-02-27 09:39:51

# Below is generated by plot.py at 2018-02-27 10:37:56

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.67 Mbit/s (5.6% utilization)

95th percentile per-packet one-way delay: 11.799 ms

Loss rate: 35.78%

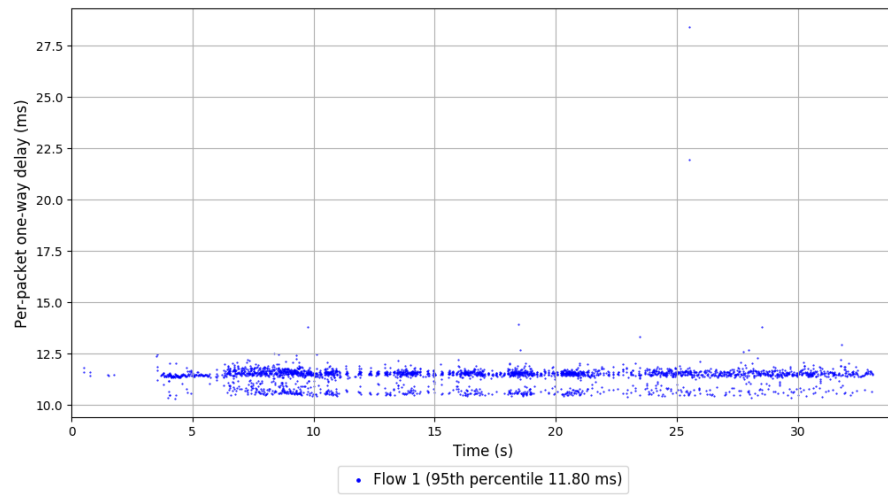
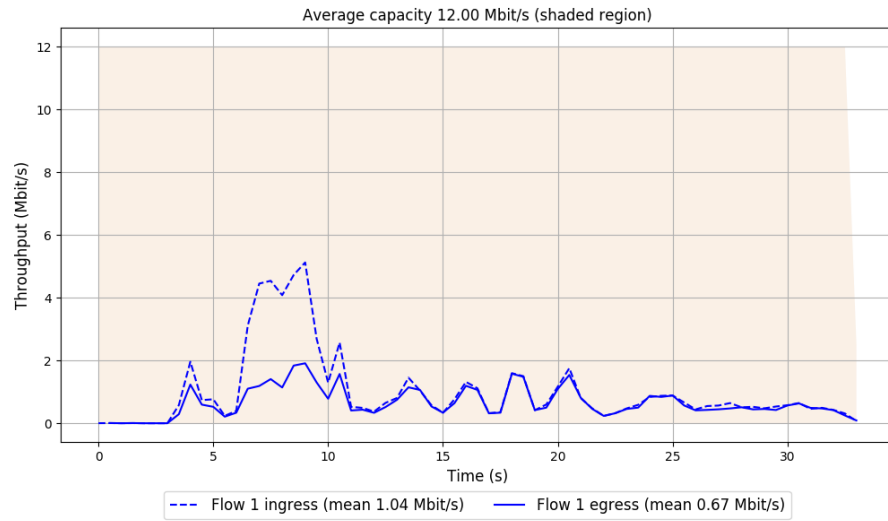
-- Flow 1:

Average throughput: 0.67 Mbit/s

95th percentile per-packet one-way delay: 11.799 ms

Loss rate: 35.78%

## Run 5: Report of WebRTC media — Data Link



Run 6: Statistics of WebRTC media

Start at: 2018-02-27 09:49:33

End at: 2018-02-27 09:50:03

# Below is generated by plot.py at 2018-02-27 10:37:57

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.60 Mbit/s (5.0% utilization)

95th percentile per-packet one-way delay: 11.871 ms

Loss rate: 38.69%

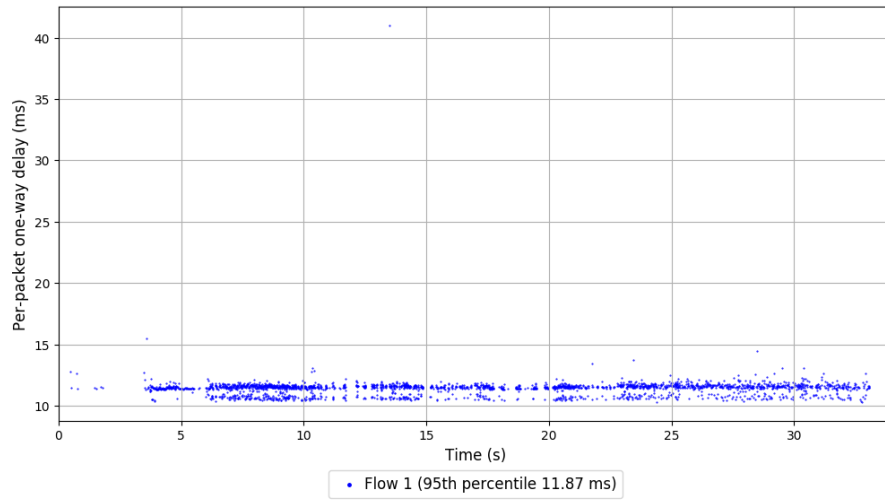
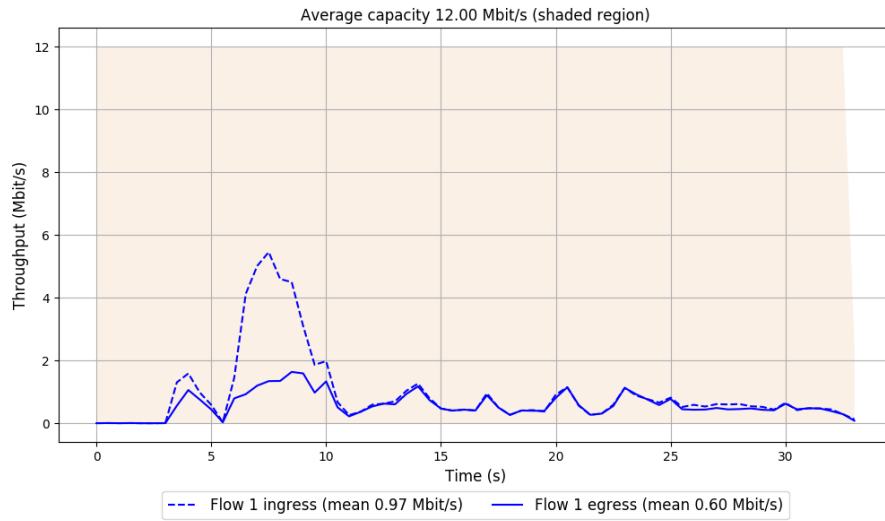
-- Flow 1:

Average throughput: 0.60 Mbit/s

95th percentile per-packet one-way delay: 11.871 ms

Loss rate: 38.69%

### Run 6: Report of WebRTC media — Data Link



Run 7: Statistics of WebRTC media

Start at: 2018-02-27 09:59:44

End at: 2018-02-27 10:00:14

# Below is generated by plot.py at 2018-02-27 10:37:58

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.61 Mbit/s (5.1% utilization)

95th percentile per-packet one-way delay: 11.860 ms

Loss rate: 39.46%

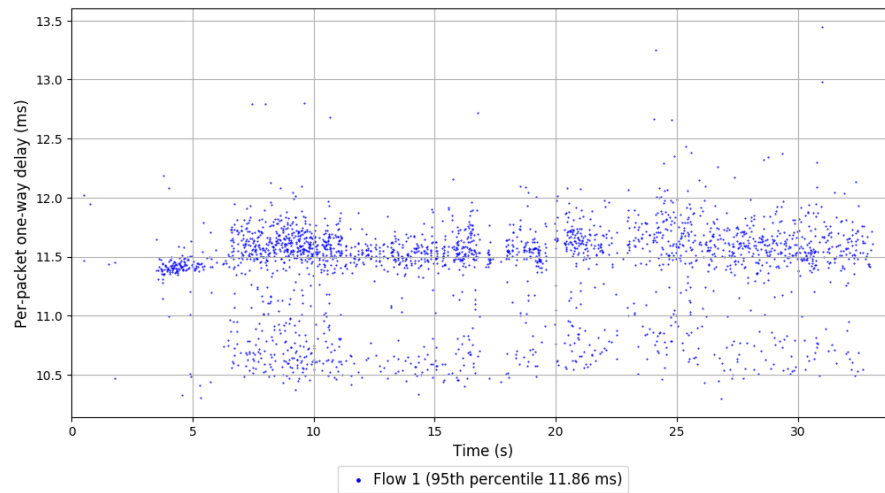
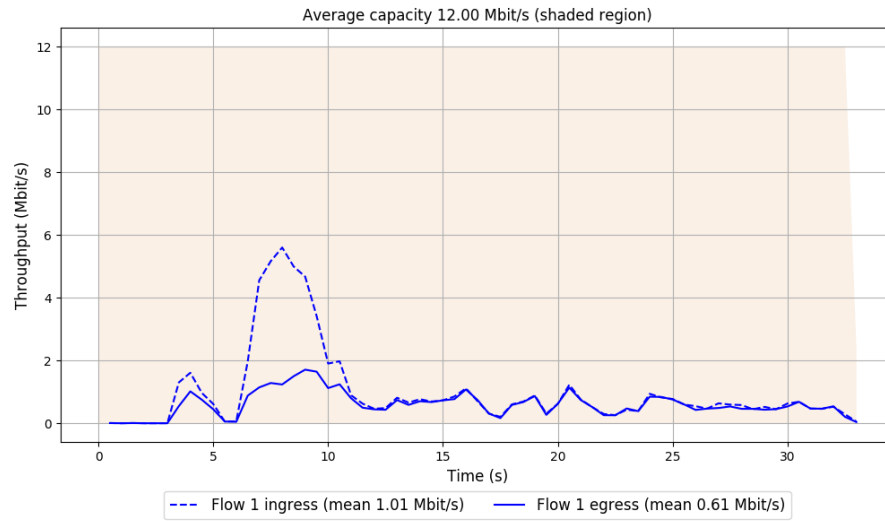
-- Flow 1:

Average throughput: 0.61 Mbit/s

95th percentile per-packet one-way delay: 11.860 ms

Loss rate: 39.46%

## Run 7: Report of WebRTC media — Data Link



Run 8: Statistics of WebRTC media

Start at: 2018-02-27 10:09:55

End at: 2018-02-27 10:10:25

# Below is generated by plot.py at 2018-02-27 10:37:58

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.60 Mbit/s (5.0% utilization)

95th percentile per-packet one-way delay: 11.897 ms

Loss rate: 26.30%

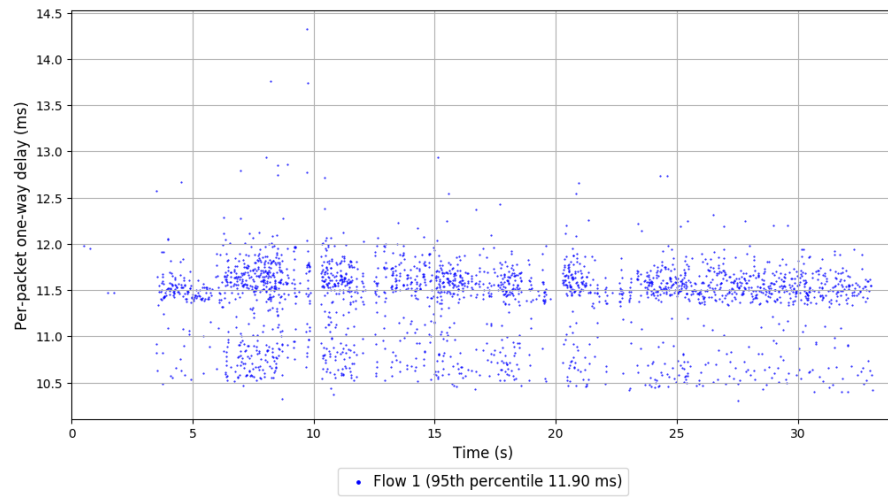
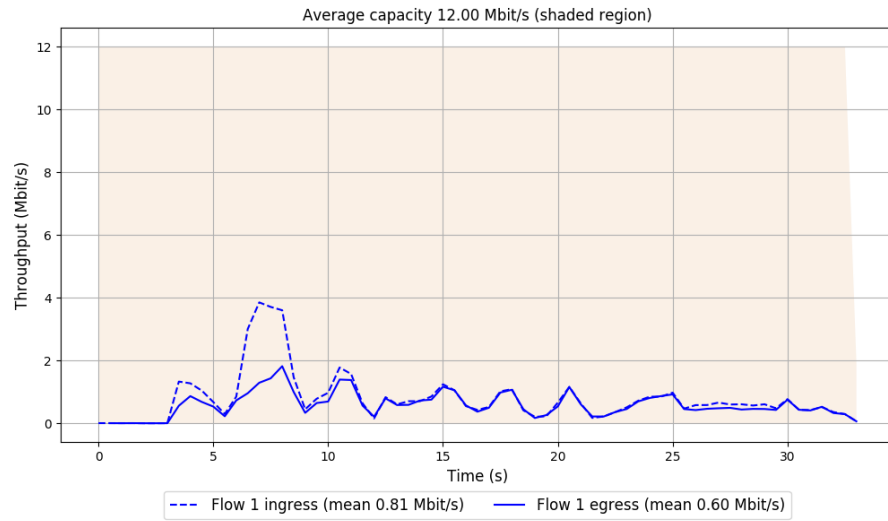
-- Flow 1:

Average throughput: 0.60 Mbit/s

95th percentile per-packet one-way delay: 11.897 ms

Loss rate: 26.30%

## Run 8: Report of WebRTC media — Data Link



Run 9: Statistics of WebRTC media

Start at: 2018-02-27 10:20:10

End at: 2018-02-27 10:20:40

# Below is generated by plot.py at 2018-02-27 10:37:59

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.66 Mbit/s (5.5% utilization)

95th percentile per-packet one-way delay: 11.893 ms

Loss rate: 41.37%

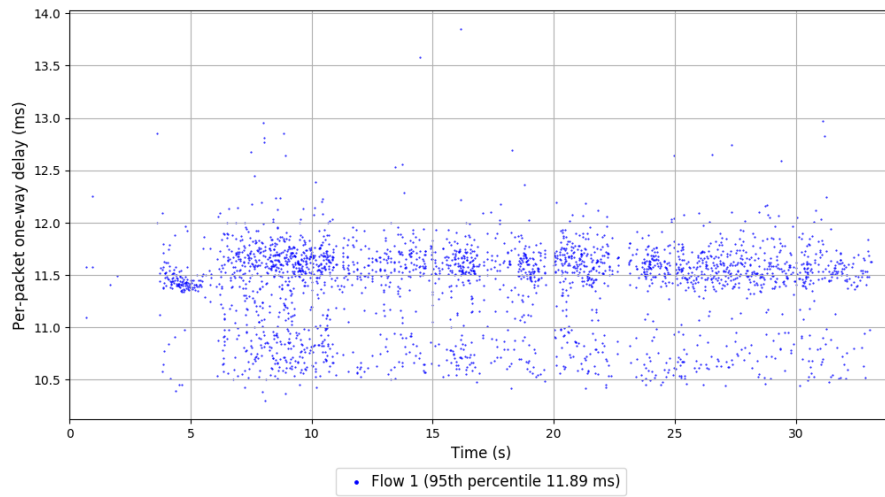
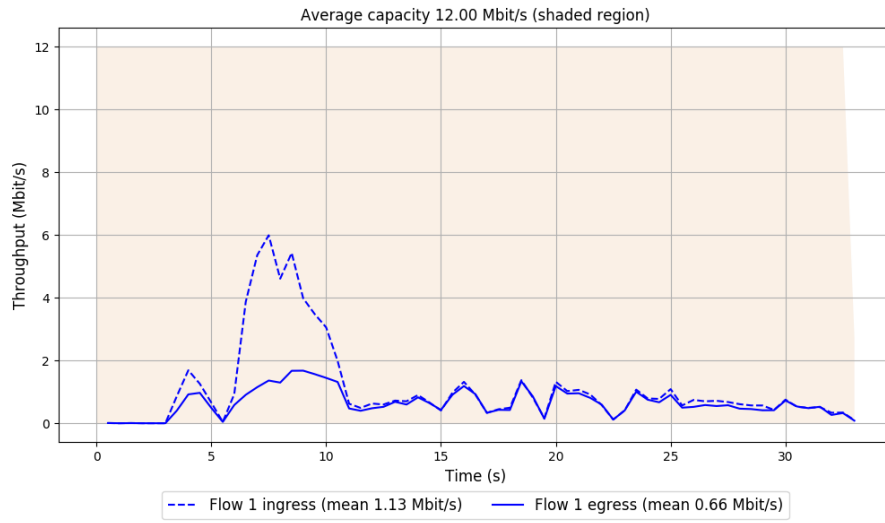
-- Flow 1:

Average throughput: 0.66 Mbit/s

95th percentile per-packet one-way delay: 11.893 ms

Loss rate: 41.37%

### Run 9: Report of WebRTC media — Data Link



Run 10: Statistics of WebRTC media

Start at: 2018-02-27 10:30:21

End at: 2018-02-27 10:30:51

# Below is generated by plot.py at 2018-02-27 10:38:01

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.70 Mbit/s (5.8% utilization)

95th percentile per-packet one-way delay: 11.978 ms

Loss rate: 38.82%

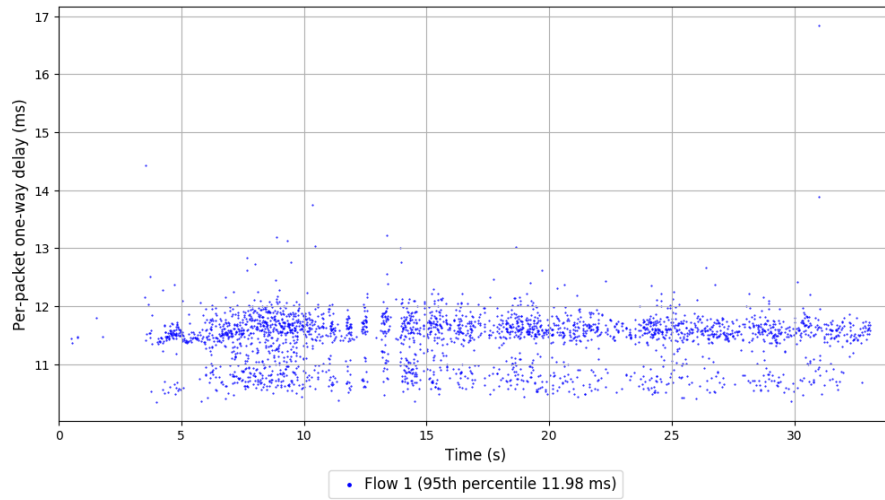
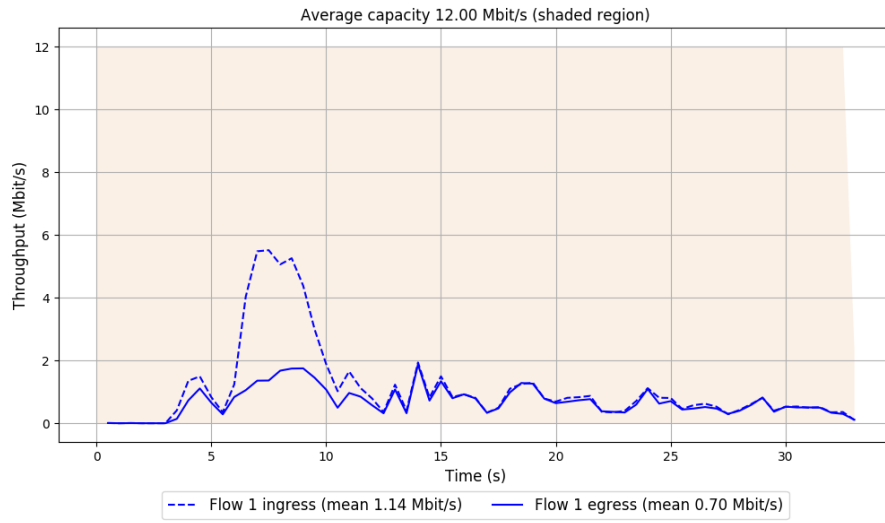
-- Flow 1:

Average throughput: 0.70 Mbit/s

95th percentile per-packet one-way delay: 11.978 ms

Loss rate: 38.82%

Run 10: Report of WebRTC media — Data Link



Run 1: Statistics of Sprout

Start at: 2018-02-27 08:59:37

End at: 2018-02-27 09:00:07

# Below is generated by plot.py at 2018-02-27 10:38:03

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.50 Mbit/s (4.2% utilization)

95th percentile per-packet one-way delay: 11.703 ms

Loss rate: 6.37%

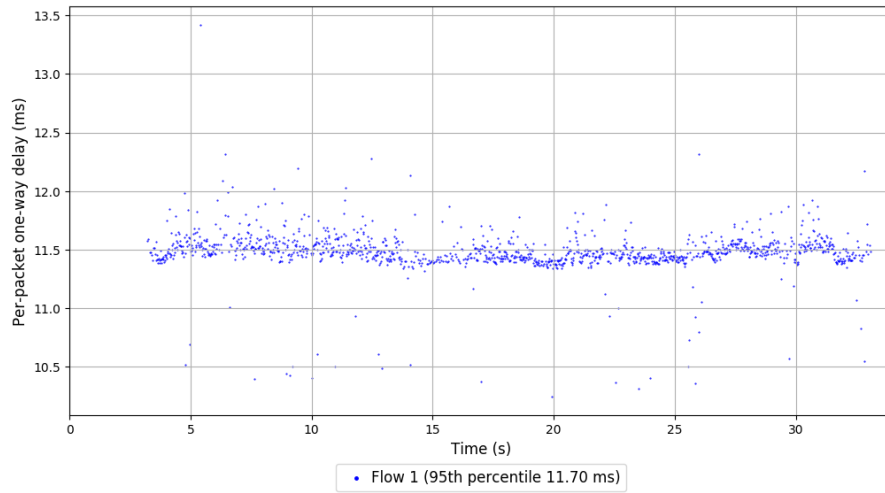
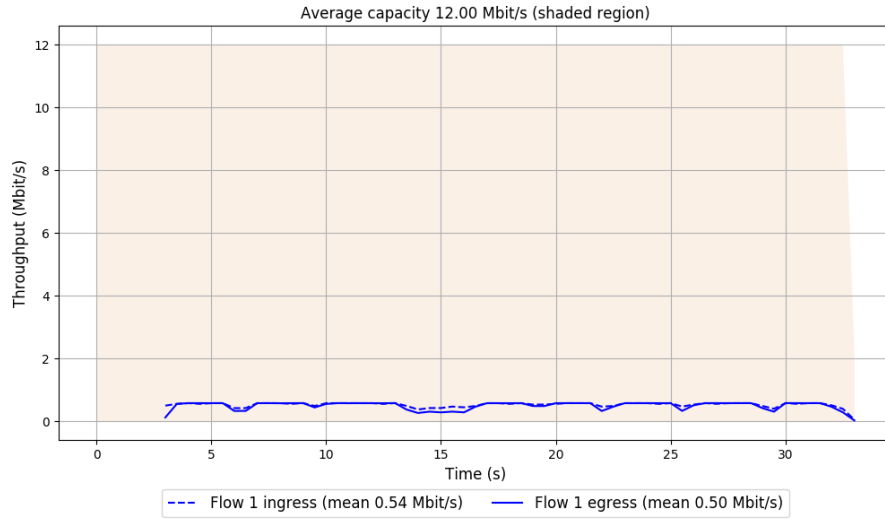
-- Flow 1:

Average throughput: 0.50 Mbit/s

95th percentile per-packet one-way delay: 11.703 ms

Loss rate: 6.37%

# Run 1: Report of Sprout — Data Link



Run 2: Statistics of Sprout

Start at: 2018-02-27 09:09:47

End at: 2018-02-27 09:10:17

# Below is generated by plot.py at 2018-02-27 10:38:03

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.49 Mbit/s (4.1% utilization)

95th percentile per-packet one-way delay: 11.664 ms

Loss rate: 8.30%

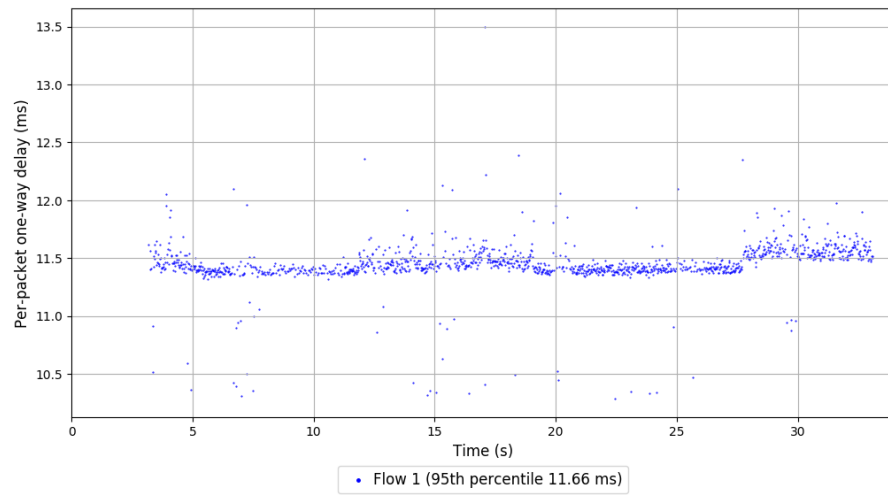
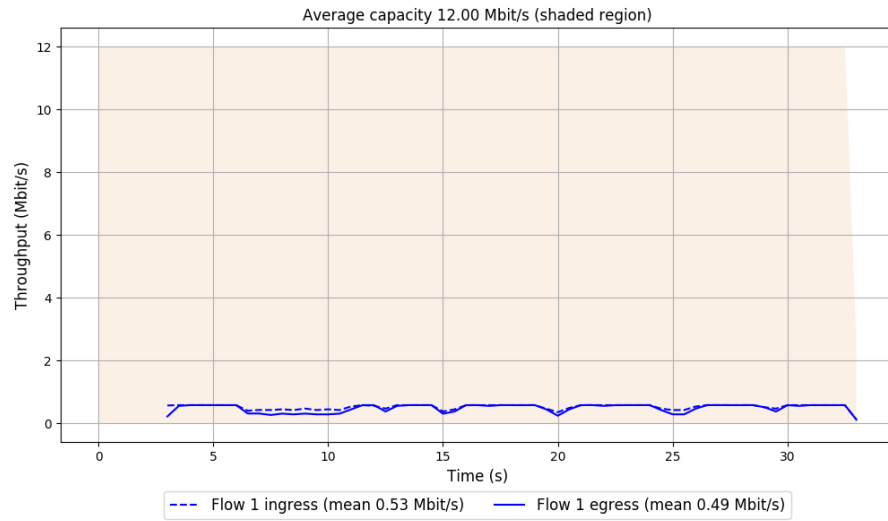
-- Flow 1:

Average throughput: 0.49 Mbit/s

95th percentile per-packet one-way delay: 11.664 ms

Loss rate: 8.30%

## Run 2: Report of Sprout — Data Link



Run 3: Statistics of Sprout

Start at: 2018-02-27 09:19:59

End at: 2018-02-27 09:20:29

# Below is generated by plot.py at 2018-02-27 10:38:05

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.51 Mbit/s (4.2% utilization)

95th percentile per-packet one-way delay: 11.567 ms

Loss rate: 5.28%

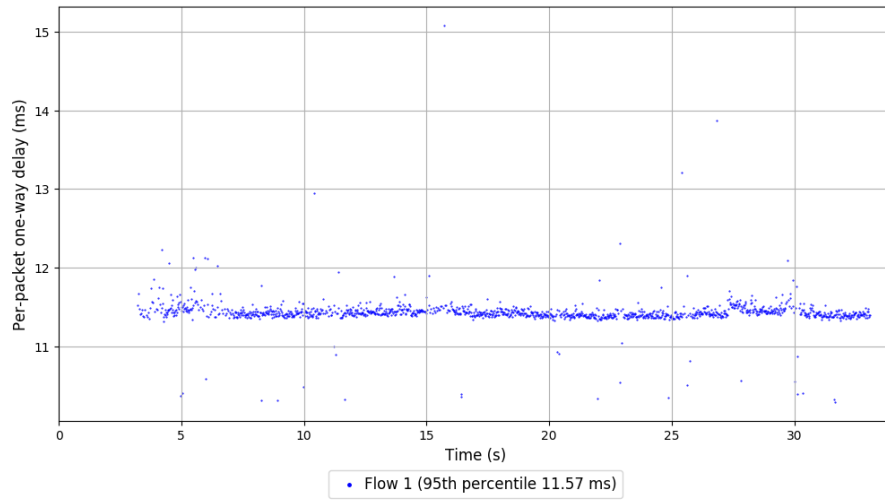
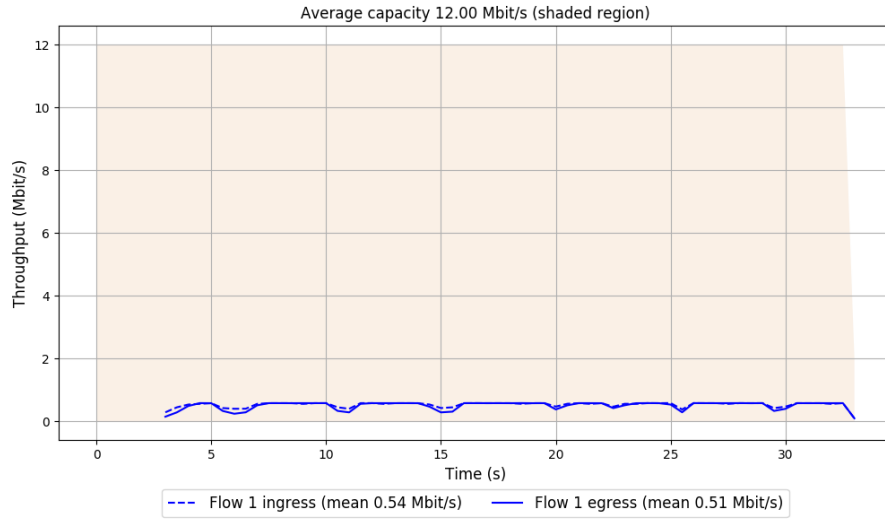
-- Flow 1:

Average throughput: 0.51 Mbit/s

95th percentile per-packet one-way delay: 11.567 ms

Loss rate: 5.28%

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



Run 4: Statistics of Sprout

Start at: 2018-02-27 09:30:14

End at: 2018-02-27 09:30:44

# Below is generated by plot.py at 2018-02-27 10:38:06

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.50 Mbit/s (4.2% utilization)

95th percentile per-packet one-way delay: 11.687 ms

Loss rate: 6.99%

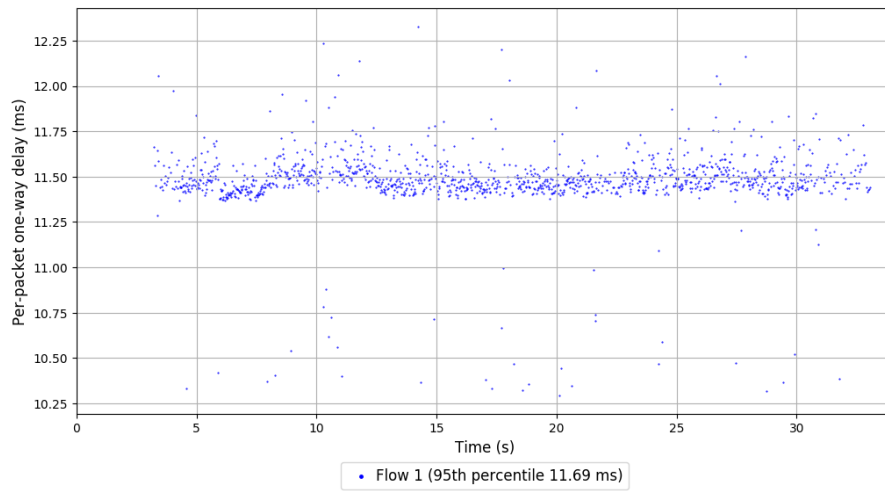
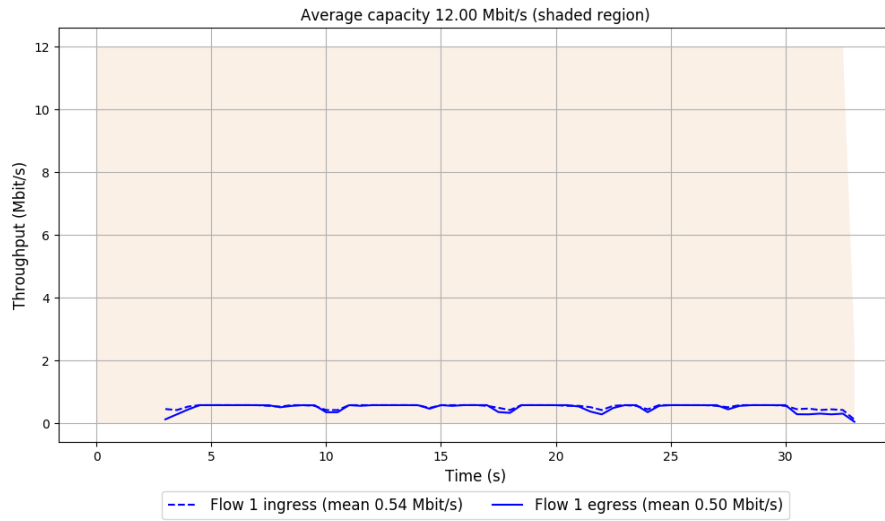
-- Flow 1:

Average throughput: 0.50 Mbit/s

95th percentile per-packet one-way delay: 11.687 ms

Loss rate: 6.99%

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



Run 5: Statistics of Sprout

Start at: 2018-02-27 09:40:28

End at: 2018-02-27 09:40:58

# Below is generated by plot.py at 2018-02-27 10:38:07

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.48 Mbit/s (4.0% utilization)

95th percentile per-packet one-way delay: 11.613 ms

Loss rate: 8.68%

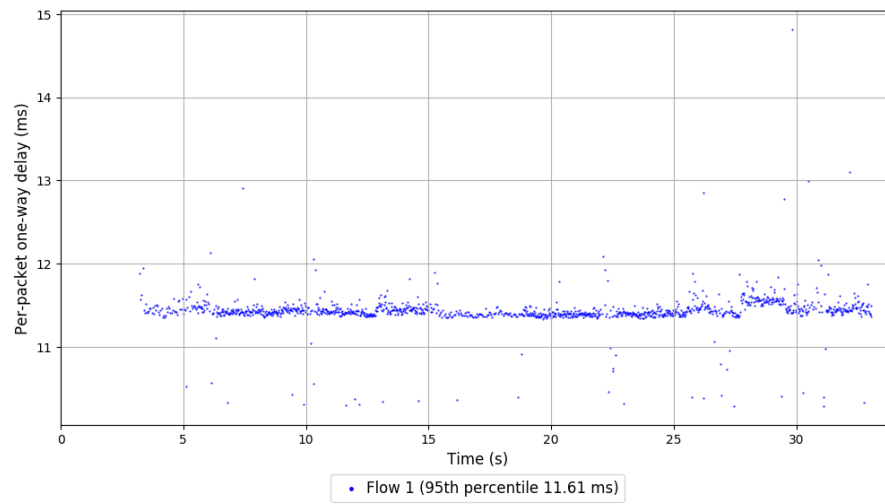
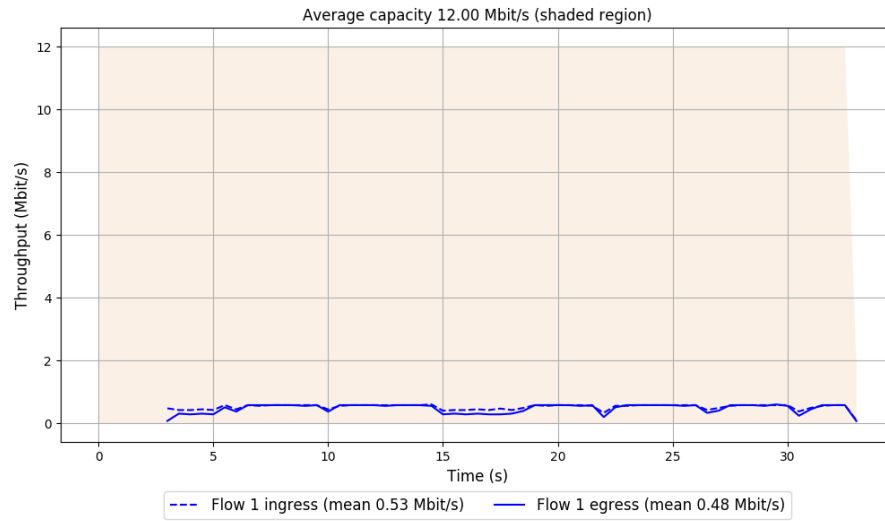
-- Flow 1:

Average throughput: 0.48 Mbit/s

95th percentile per-packet one-way delay: 11.613 ms

Loss rate: 8.68%

## Run 5: Report of Sprout — Data Link



Run 6: Statistics of Sprout

Start at: 2018-02-27 09:50:41

End at: 2018-02-27 09:51:11

# Below is generated by plot.py at 2018-02-27 10:38:07

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.48 Mbit/s (4.0% utilization)

95th percentile per-packet one-way delay: 11.575 ms

Loss rate: 8.63%

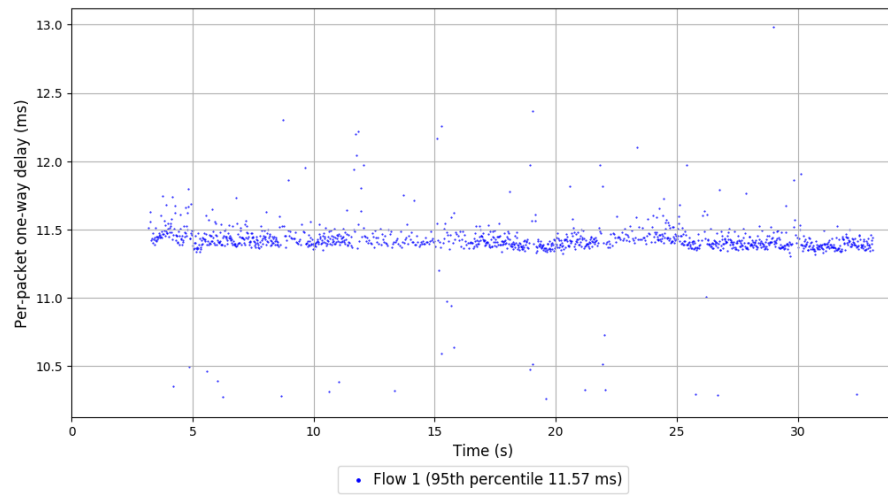
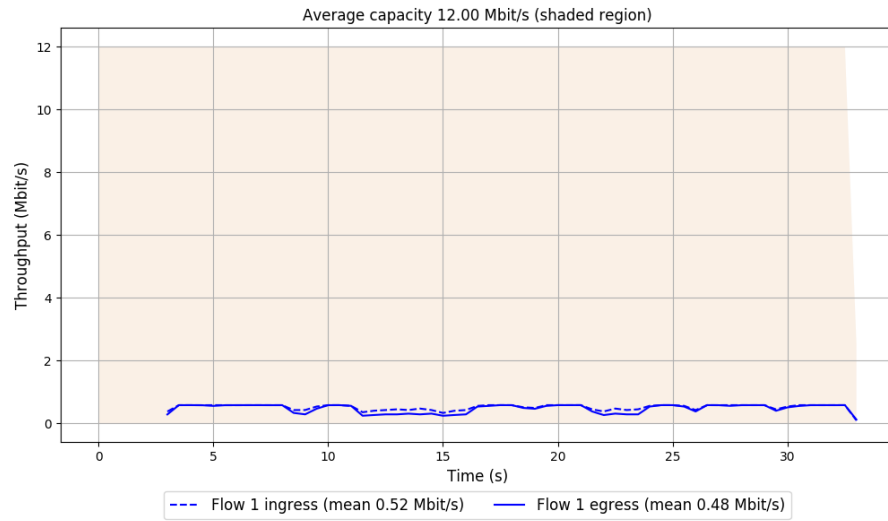
-- Flow 1:

Average throughput: 0.48 Mbit/s

95th percentile per-packet one-way delay: 11.575 ms

Loss rate: 8.63%

## Run 6: Report of Sprout — Data Link



Run 7: Statistics of Sprout

Start at: 2018-02-27 10:00:52

End at: 2018-02-27 10:01:22

# Below is generated by plot.py at 2018-02-27 10:38:08

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.51 Mbit/s (4.3% utilization)

95th percentile per-packet one-way delay: 11.583 ms

Loss rate: 5.77%

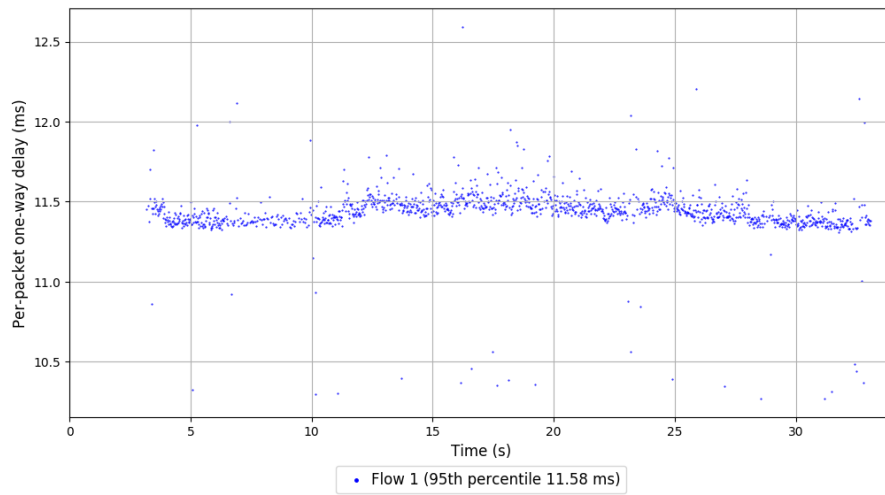
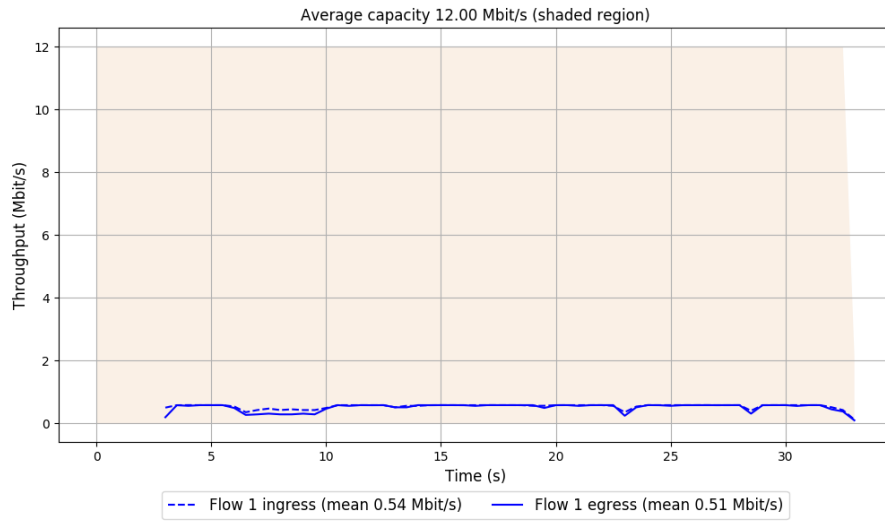
-- Flow 1:

Average throughput: 0.51 Mbit/s

95th percentile per-packet one-way delay: 11.583 ms

Loss rate: 5.77%

### Run 7: Report of Sprout — Data Link



Run 8: Statistics of Sprout

Start at: 2018-02-27 10:11:03

End at: 2018-02-27 10:11:33

# Below is generated by plot.py at 2018-02-27 10:38:10

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.51 Mbit/s (4.2% utilization)

95th percentile per-packet one-way delay: 11.537 ms

Loss rate: 6.13%

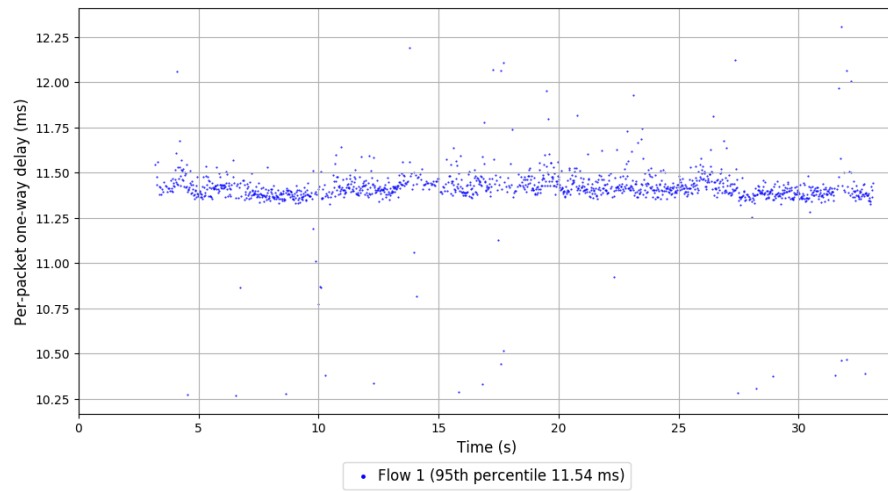
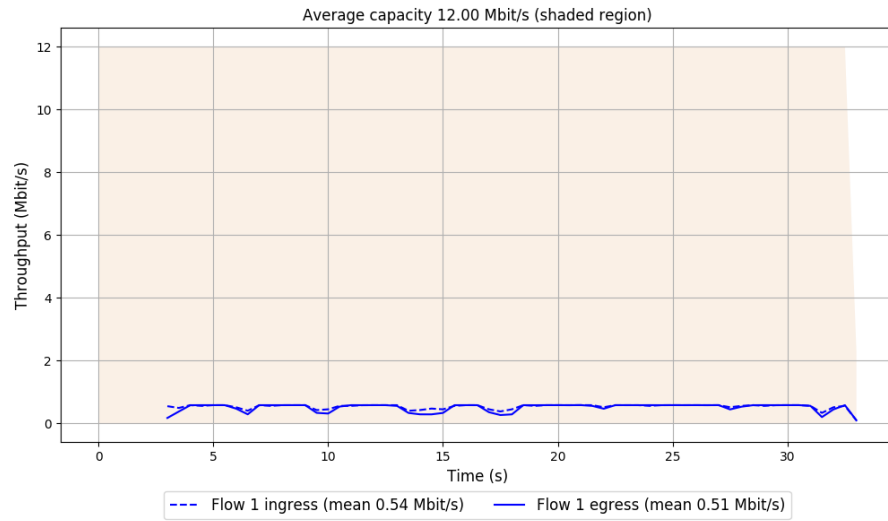
-- Flow 1:

Average throughput: 0.51 Mbit/s

95th percentile per-packet one-way delay: 11.537 ms

Loss rate: 6.13%

## Run 8: Report of Sprout — Data Link



Run 9: Statistics of Sprout

Start at: 2018-02-27 10:21:17

End at: 2018-02-27 10:21:47

# Below is generated by plot.py at 2018-02-27 10:38:12

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.42 Mbit/s (3.5% utilization)

95th percentile per-packet one-way delay: 11.471 ms

Loss rate: 15.75%

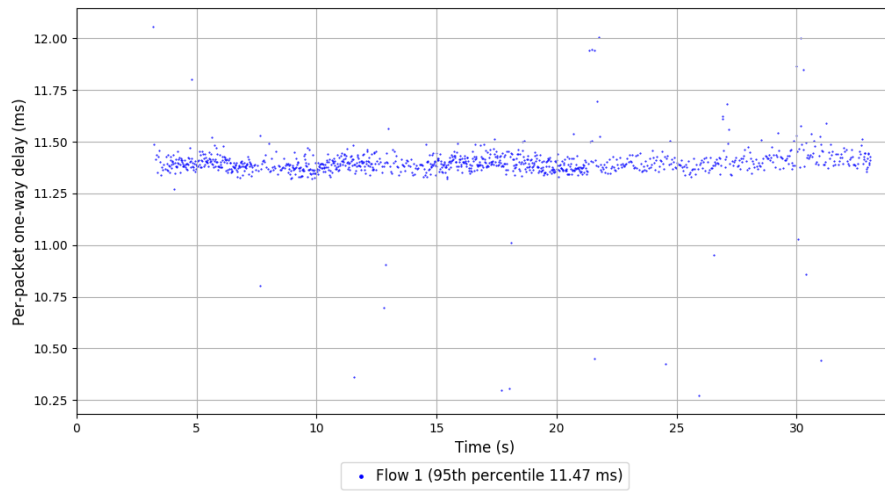
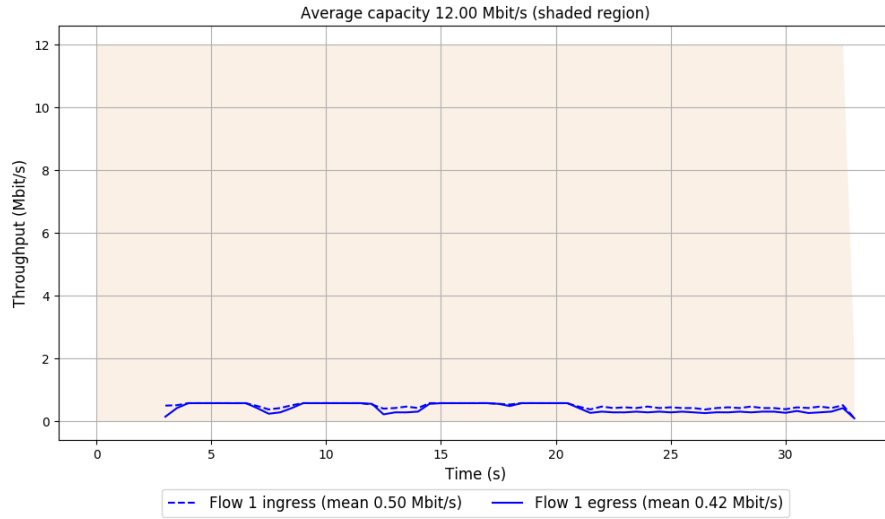
-- Flow 1:

Average throughput: 0.42 Mbit/s

95th percentile per-packet one-way delay: 11.471 ms

Loss rate: 15.75%

### Run 9: Report of Sprout — Data Link



Run 10: Statistics of Sprout

Start at: 2018-02-27 10:31:29

End at: 2018-02-27 10:31:59

# Below is generated by plot.py at 2018-02-27 10:38:12

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.48 Mbit/s (4.0% utilization)

95th percentile per-packet one-way delay: 11.669 ms

Loss rate: 9.25%

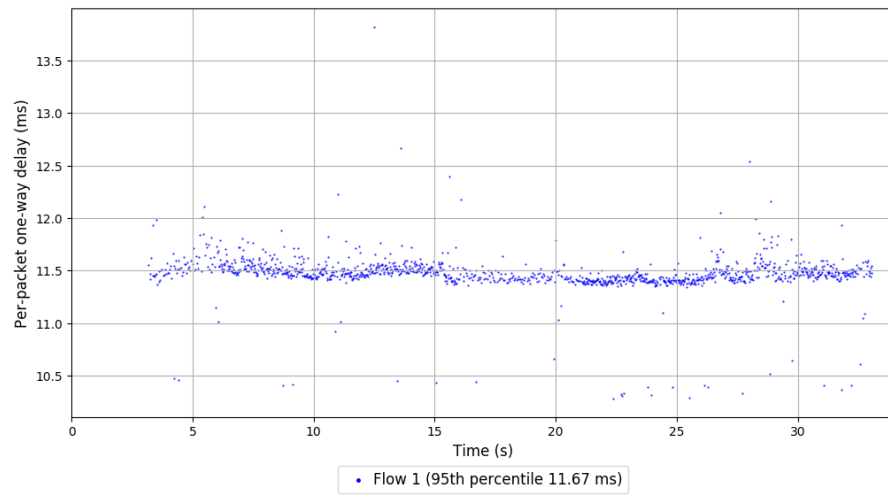
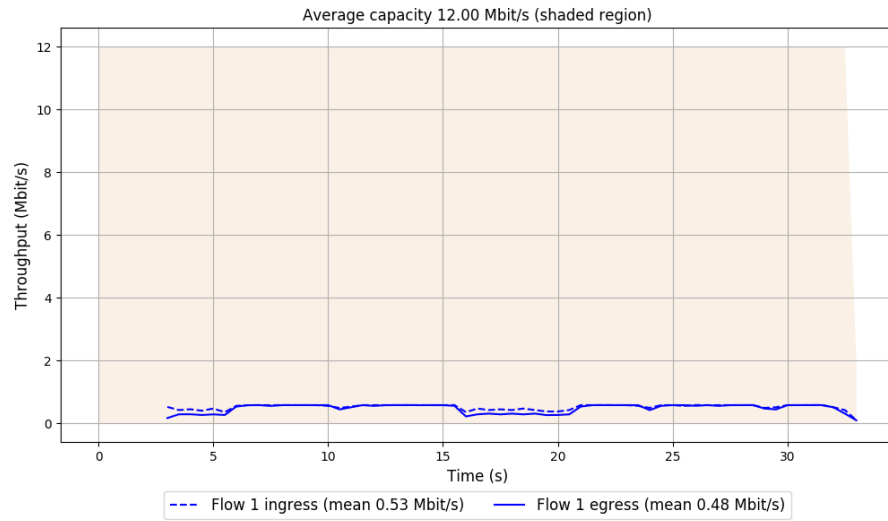
-- Flow 1:

Average throughput: 0.48 Mbit/s

95th percentile per-packet one-way delay: 11.669 ms

Loss rate: 9.25%

## Run 10: Report of Sprout — Data Link

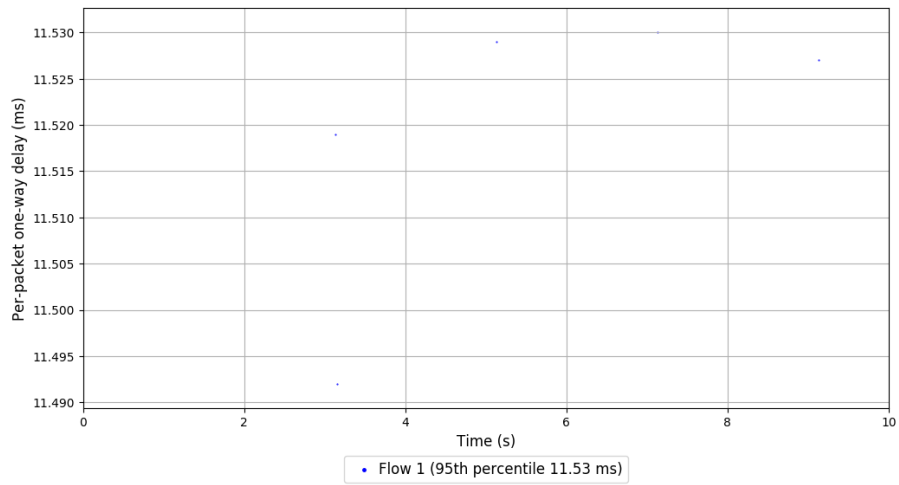
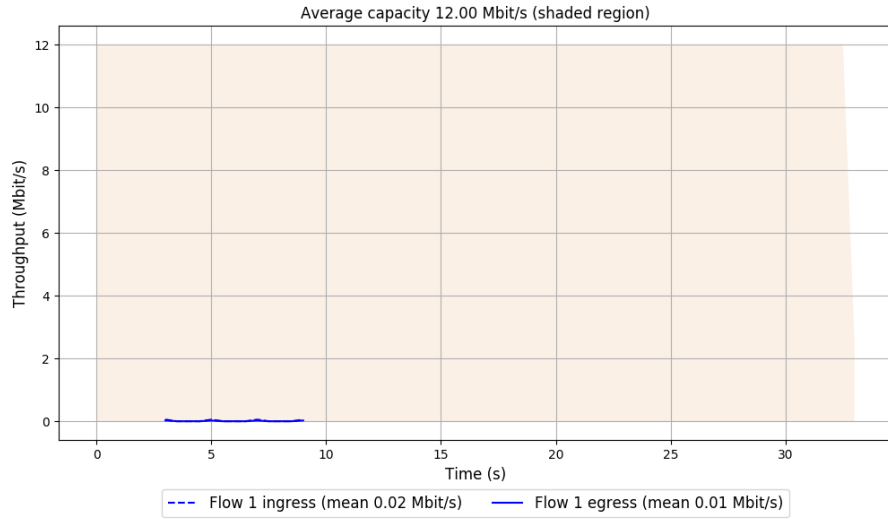


Run 1: Statistics of TaoVA-100x

Start at: 2018-02-27 08:55:39

End at: 2018-02-27 08:56:09

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



Run 2: Statistics of TaoVA-100x

Start at: 2018-02-27 09:05:49

End at: 2018-02-27 09:06:19

# Below is generated by plot.py at 2018-02-27 10:38:15

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.01 Mbit/s (0.1% utilization)

95th percentile per-packet one-way delay: 12.989 ms

Loss rate: 53.69%

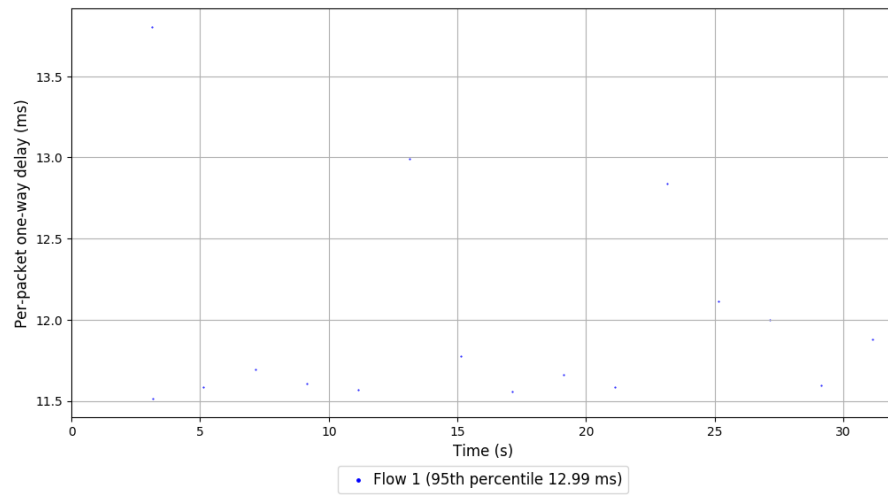
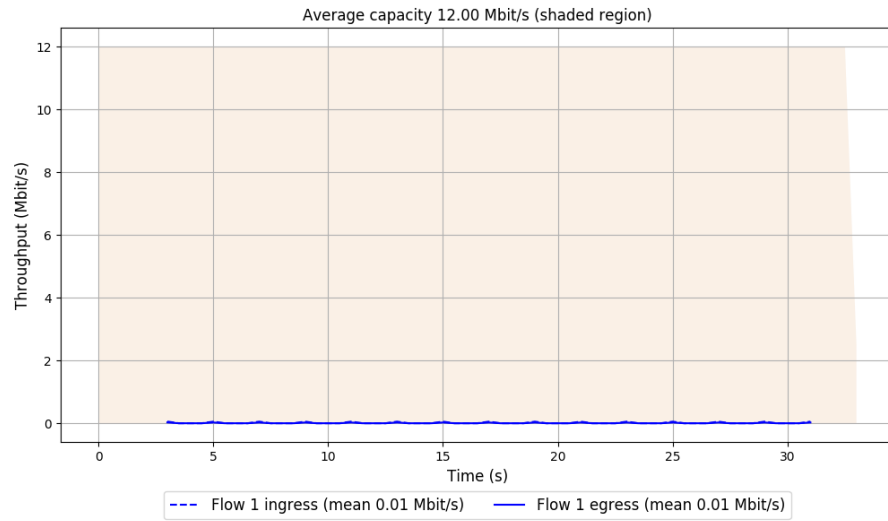
-- Flow 1:

Average throughput: 0.01 Mbit/s

95th percentile per-packet one-way delay: 12.989 ms

Loss rate: 53.69%

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



Run 3: Statistics of TaoVA-100x

Start at: 2018-02-27 09:16:01

End at: 2018-02-27 09:16:31

# Below is generated by plot.py at 2018-02-27 10:38:16

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.02 Mbit/s (0.1% utilization)

95th percentile per-packet one-way delay: 11.696 ms

Loss rate: 66.47%

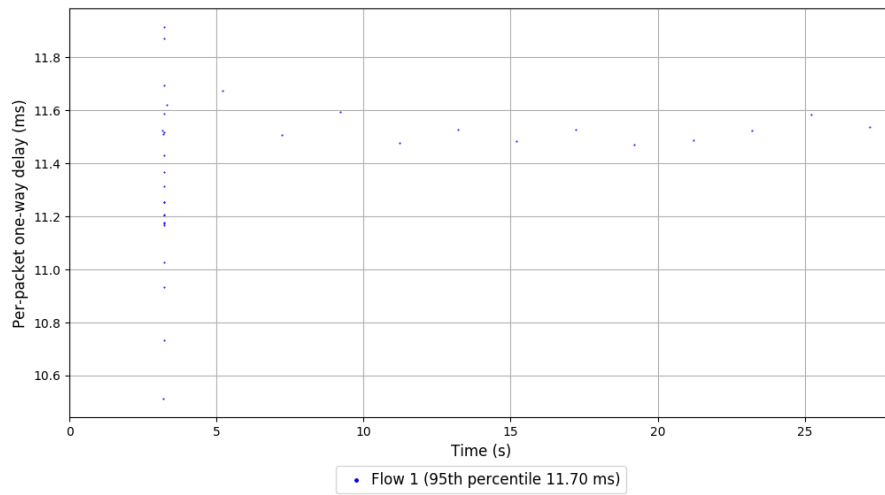
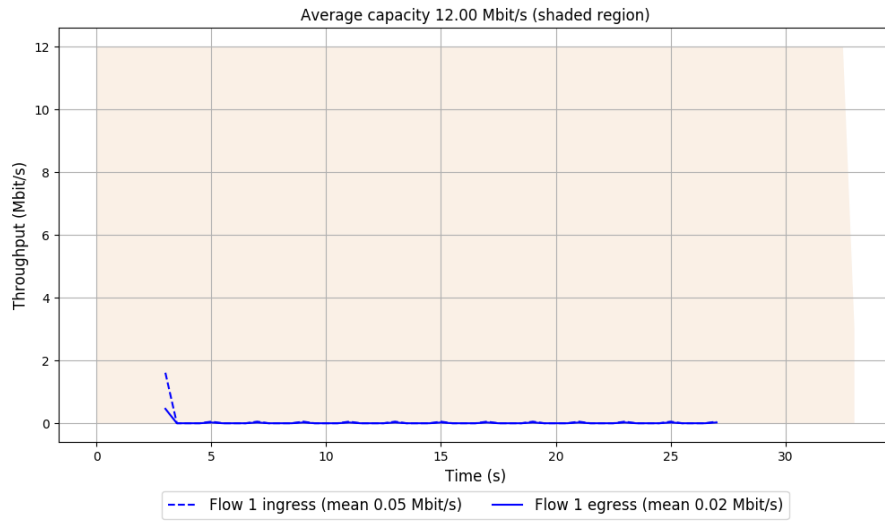
-- Flow 1:

Average throughput: 0.02 Mbit/s

95th percentile per-packet one-way delay: 11.696 ms

Loss rate: 66.47%

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



Run 4: Statistics of TaoVA-100x

Start at: 2018-02-27 09:26:16

End at: 2018-02-27 09:26:46

# Below is generated by plot.py at 2018-02-27 10:38:16

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.01 Mbit/s (0.1% utilization)

95th percentile per-packet one-way delay: 11.537 ms

Loss rate: 53.69%

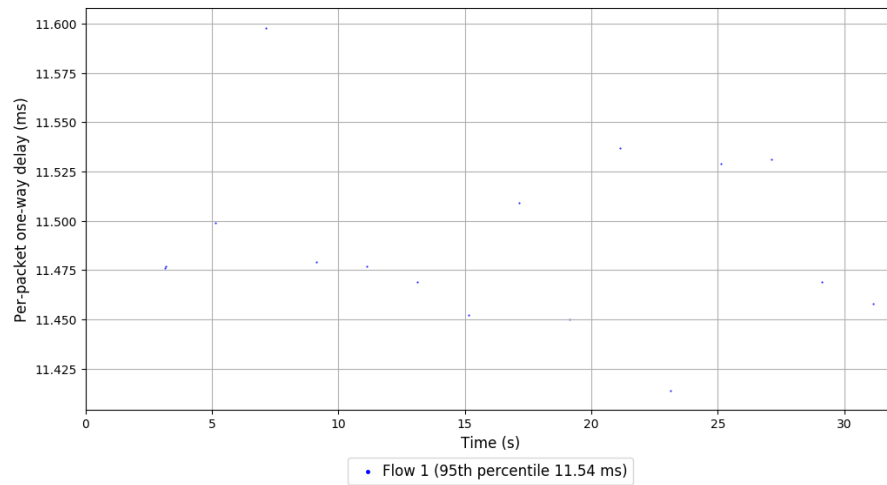
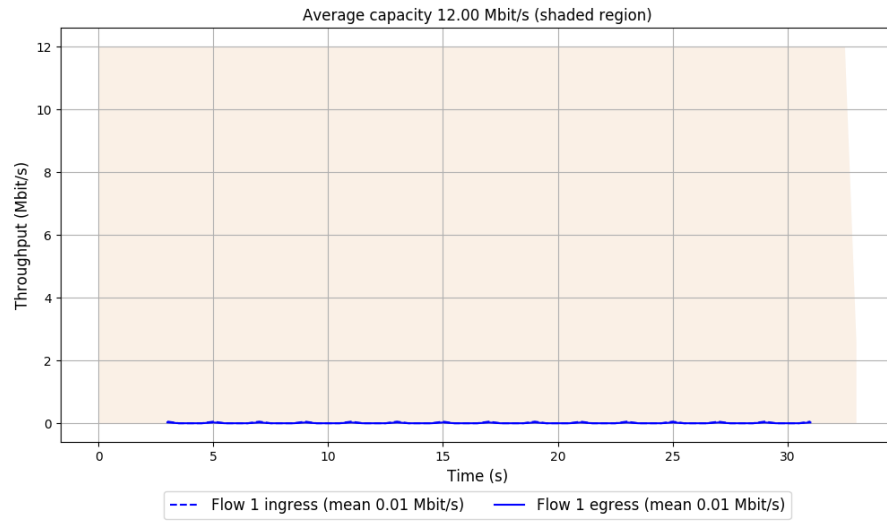
-- Flow 1:

Average throughput: 0.01 Mbit/s

95th percentile per-packet one-way delay: 11.537 ms

Loss rate: 53.69%

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

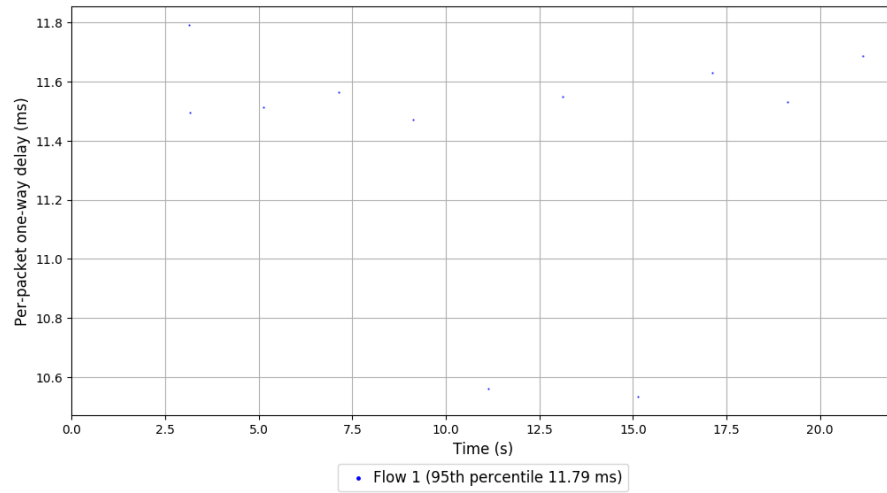
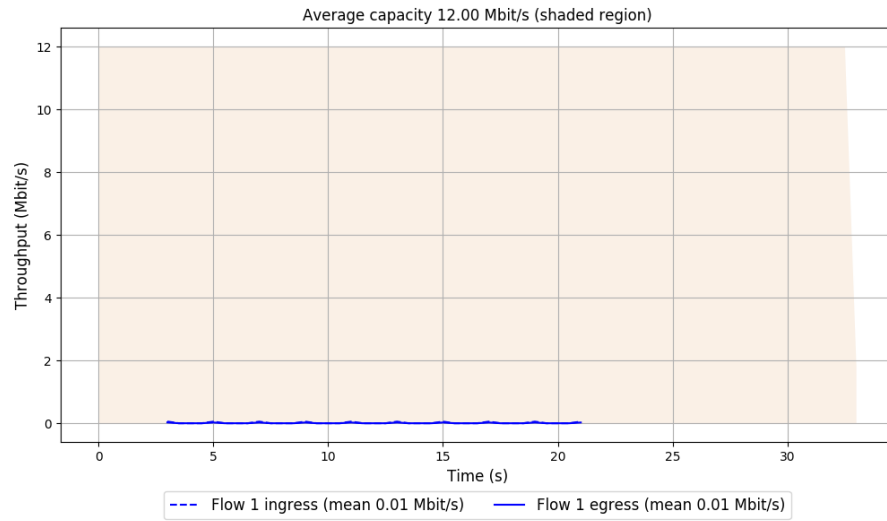


Run 5: Statistics of TaoVA-100x

Start at: 2018-02-27 09:36:30

End at: 2018-02-27 09:37:00

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

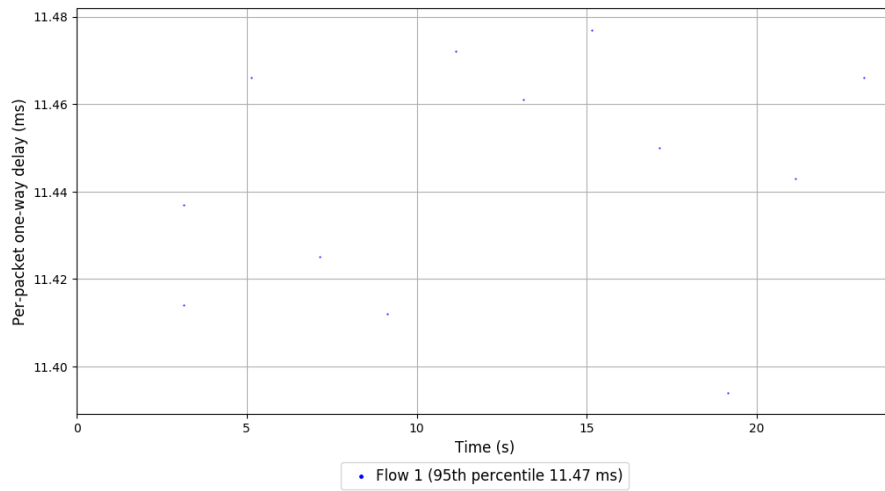
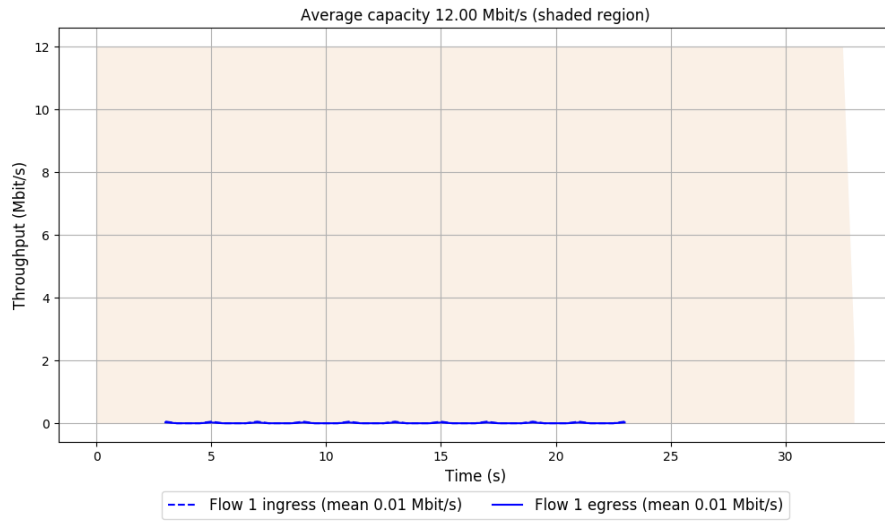


Run 6: Statistics of TaoVA-100x

Start at: 2018-02-27 09:46:42

End at: 2018-02-27 09:47:12

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

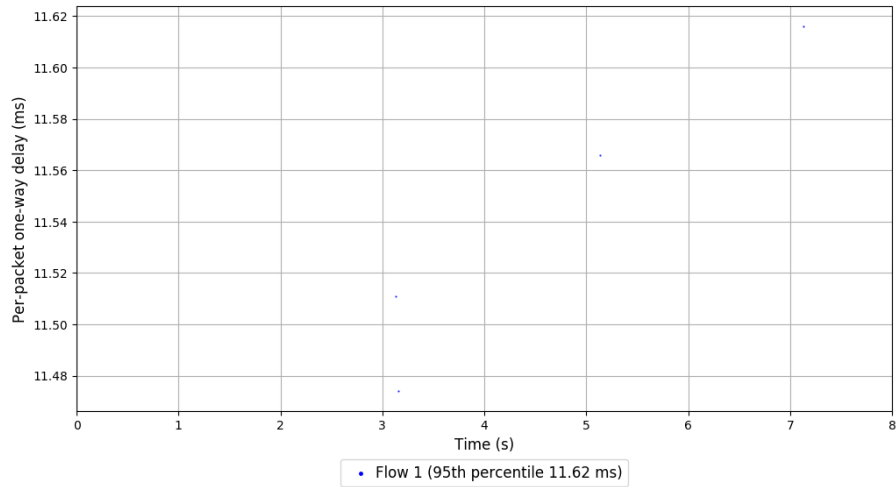
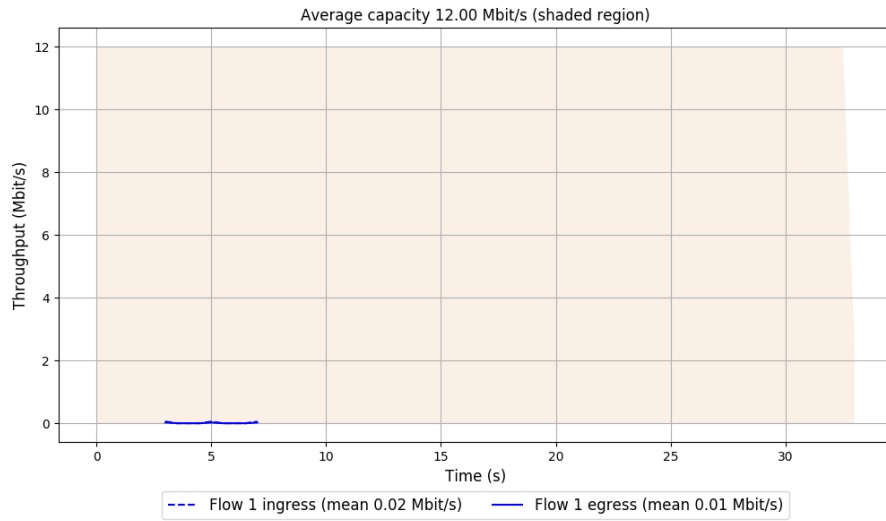


Run 7: Statistics of TaoVA-100x

Start at: 2018-02-27 09:56:54

End at: 2018-02-27 09:57:24

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



Run 8: Statistics of TaoVA-100x

Start at: 2018-02-27 10:07:04

End at: 2018-02-27 10:07:34

# Below is generated by plot.py at 2018-02-27 10:38:21

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.01 Mbit/s (0.1% utilization)

95th percentile per-packet one-way delay: 11.847 ms

Loss rate: 53.43%

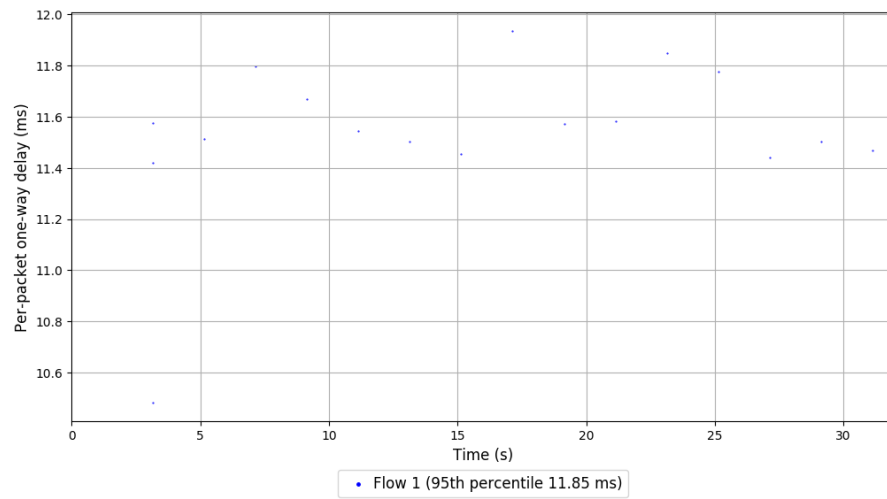
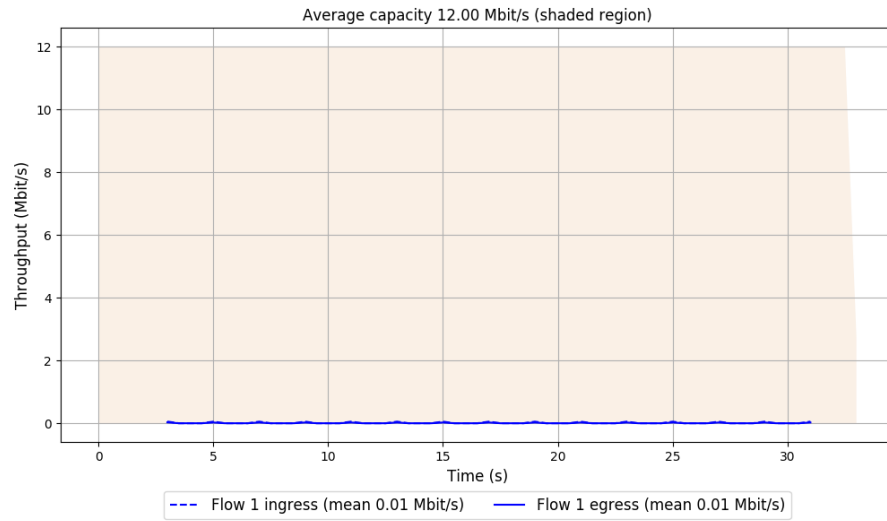
-- Flow 1:

Average throughput: 0.01 Mbit/s

95th percentile per-packet one-way delay: 11.847 ms

Loss rate: 53.43%

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



Run 9: Statistics of TaoVA-100x

Start at: 2018-02-27 10:17:20

End at: 2018-02-27 10:17:50

# Below is generated by plot.py at 2018-02-27 10:38:22

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.01 Mbit/s (0.1% utilization)

95th percentile per-packet one-way delay: 11.586 ms

Loss rate: 53.69%

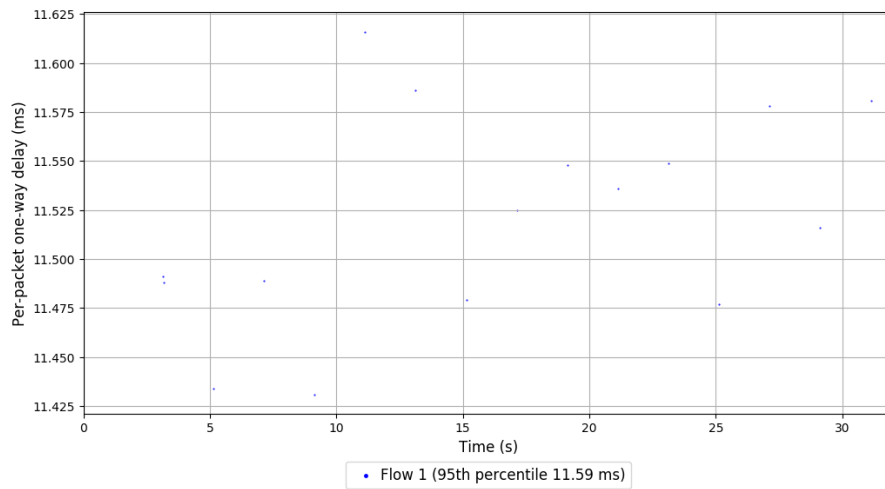
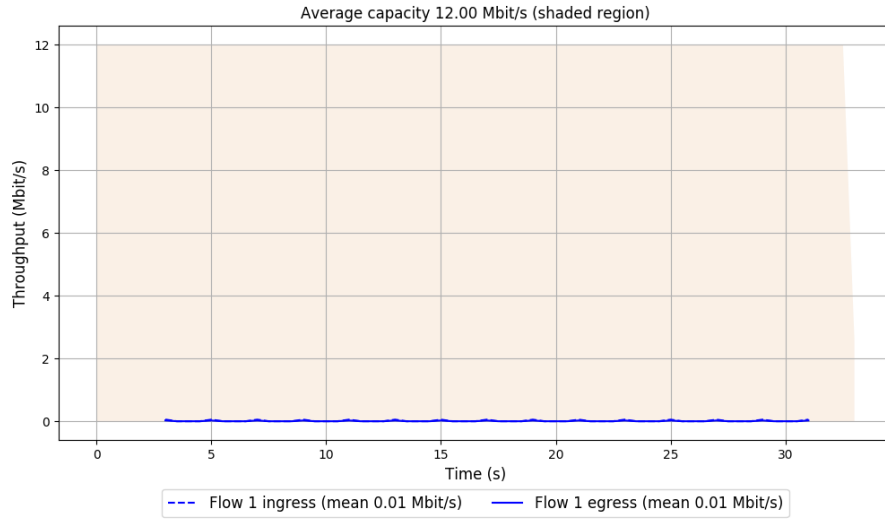
-- Flow 1:

Average throughput: 0.01 Mbit/s

95th percentile per-packet one-way delay: 11.586 ms

Loss rate: 53.69%

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



Run 10: Statistics of TaoVA-100x

Start at: 2018-02-27 10:27:31

End at: 2018-02-27 10:28:01

# Below is generated by plot.py at 2018-02-27 10:38:23

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.01 Mbit/s (0.1% utilization)

95th percentile per-packet one-way delay: 11.617 ms

Loss rate: 53.69%

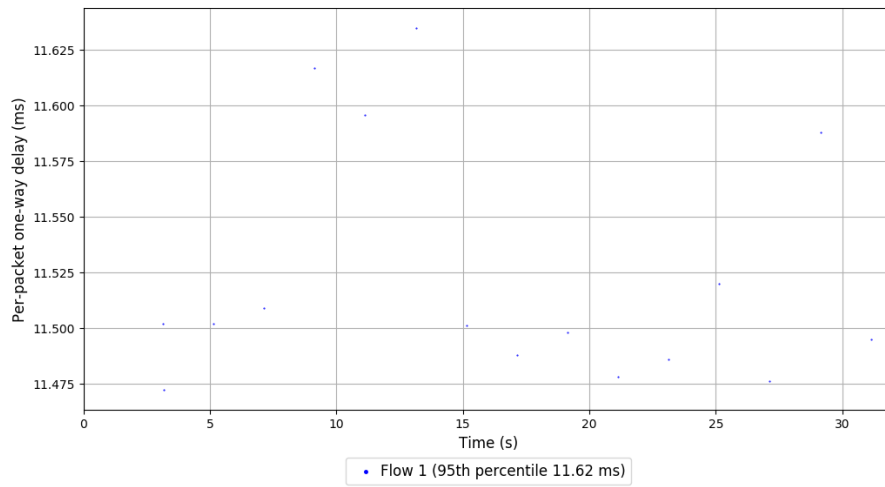
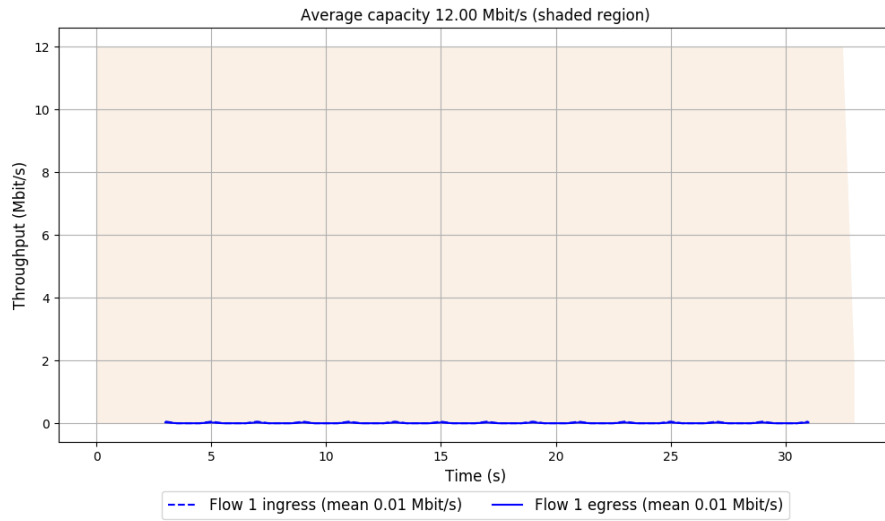
-- Flow 1:

Average throughput: 0.01 Mbit/s

95th percentile per-packet one-way delay: 11.617 ms

Loss rate: 53.69%

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



Run 1: Statistics of TCP Vegas

Start at: 2018-02-27 09:01:51

End at: 2018-02-27 09:02:21

# Below is generated by plot.py at 2018-02-27 10:38:25

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.54 Mbit/s (4.5% utilization)

95th percentile per-packet one-way delay: 11.625 ms

Loss rate: 24.54%

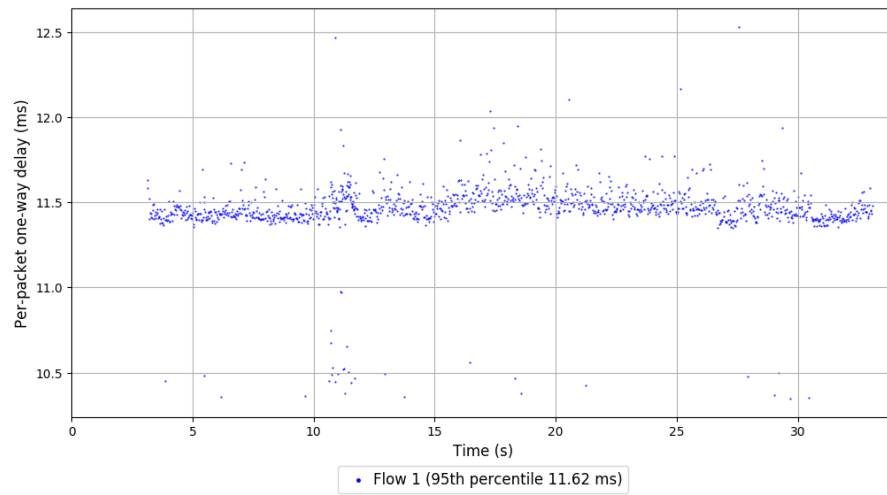
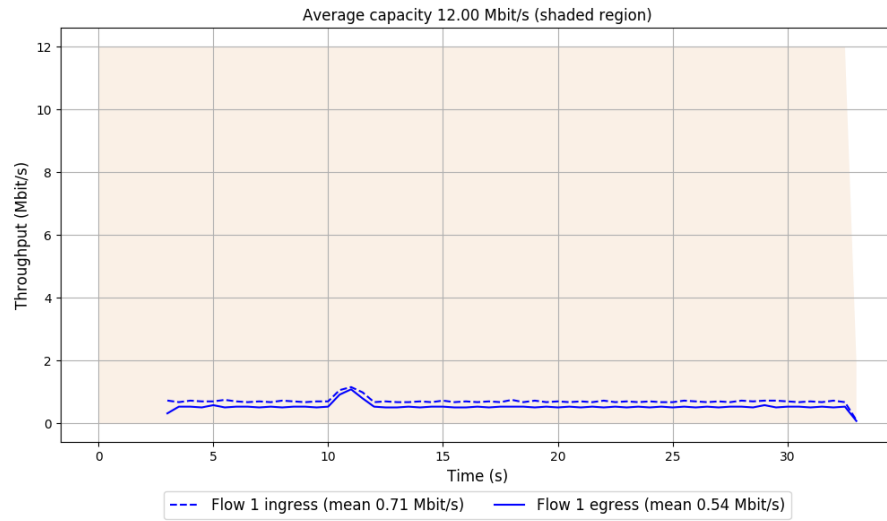
-- Flow 1:

Average throughput: 0.54 Mbit/s

95th percentile per-packet one-way delay: 11.625 ms

Loss rate: 24.54%

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



Run 2: Statistics of TCP Vegas

Start at: 2018-02-27 09:12:02

End at: 2018-02-27 09:12:32

# Below is generated by plot.py at 2018-02-27 10:38:26

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.85 Mbit/s (7.1% utilization)

95th percentile per-packet one-way delay: 11.606 ms

Loss rate: 14.23%

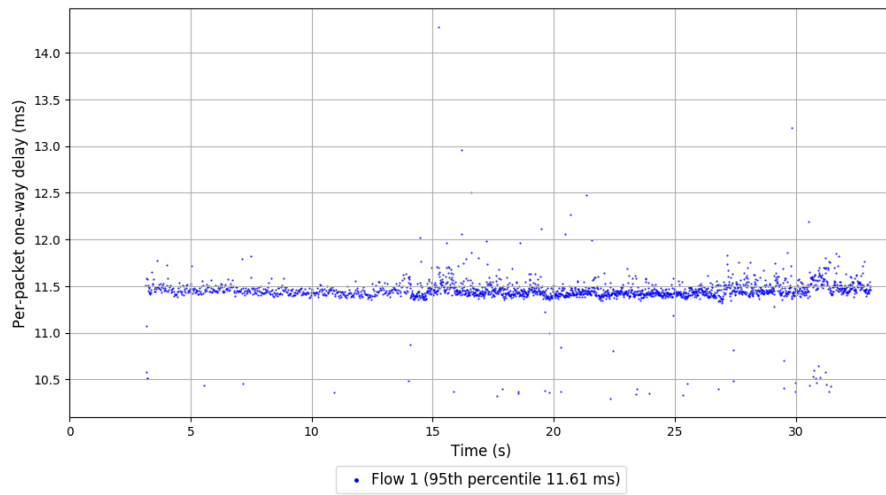
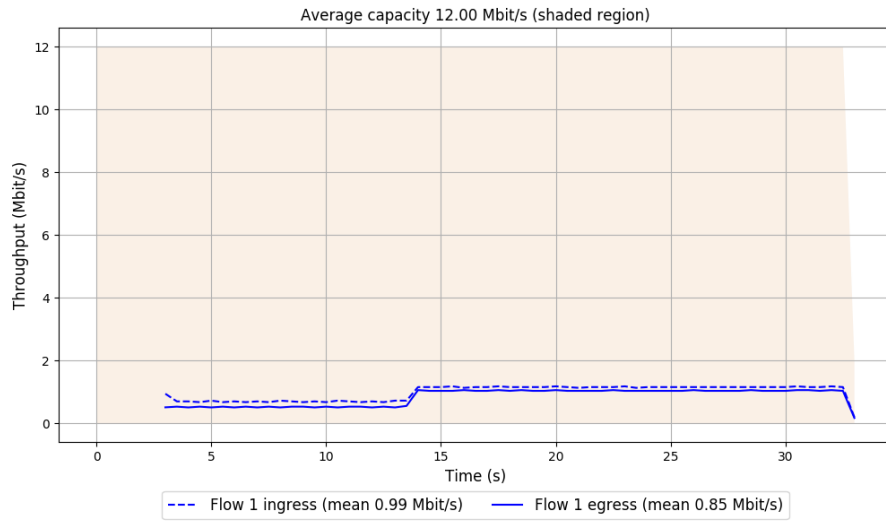
-- Flow 1:

Average throughput: 0.85 Mbit/s

95th percentile per-packet one-way delay: 11.606 ms

Loss rate: 14.23%

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



Run 3: Statistics of TCP Vegas

Start at: 2018-02-27 09:22:13

End at: 2018-02-27 09:22:43

# Below is generated by plot.py at 2018-02-27 10:38:26

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.69 Mbit/s (5.7% utilization)

95th percentile per-packet one-way delay: 11.484 ms

Loss rate: 19.01%

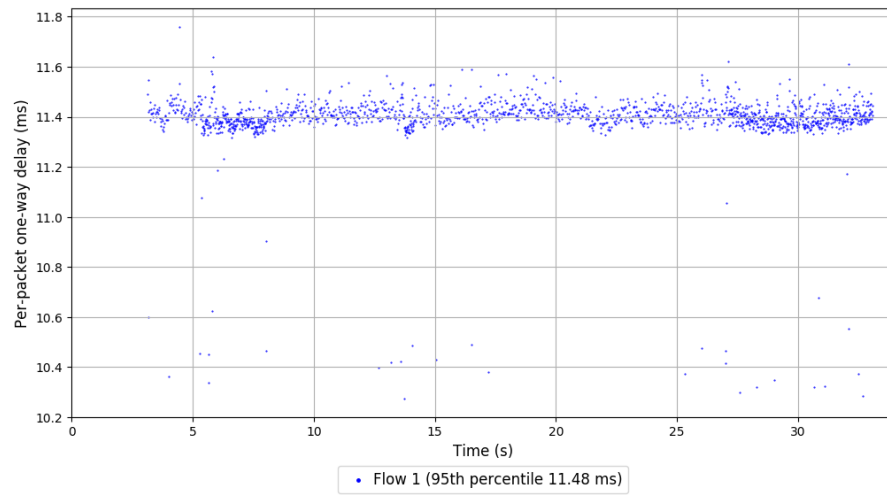
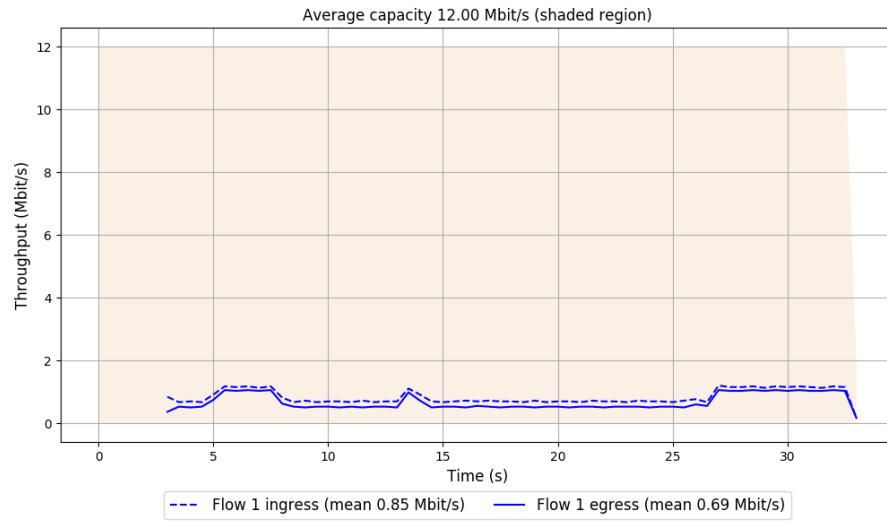
-- Flow 1:

Average throughput: 0.69 Mbit/s

95th percentile per-packet one-way delay: 11.484 ms

Loss rate: 19.01%

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



Run 4: Statistics of TCP Vegas

Start at: 2018-02-27 09:32:28

End at: 2018-02-27 09:32:58

# Below is generated by plot.py at 2018-02-27 10:38:28

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.75 Mbit/s (6.3% utilization)

95th percentile per-packet one-way delay: 11.584 ms

Loss rate: 16.97%

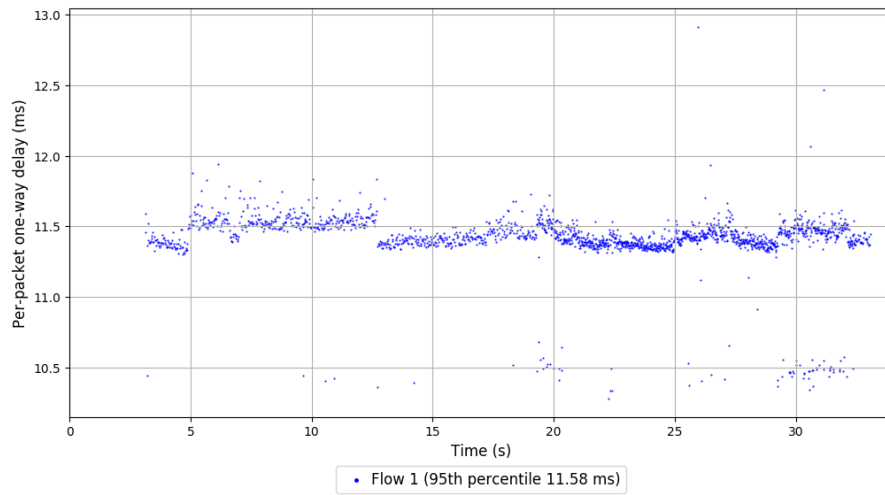
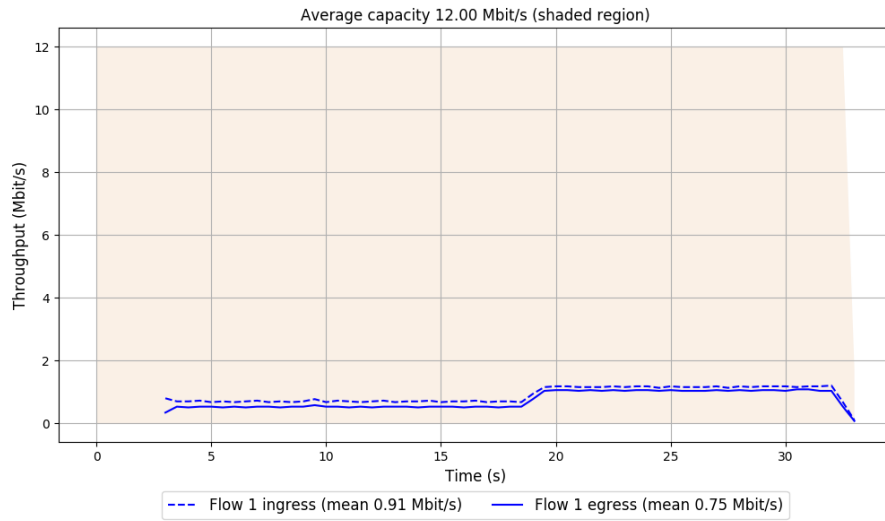
-- Flow 1:

Average throughput: 0.75 Mbit/s

95th percentile per-packet one-way delay: 11.584 ms

Loss rate: 16.97%

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



Run 5: Statistics of TCP Vegas

Start at: 2018-02-27 09:42:43

End at: 2018-02-27 09:43:13

# Below is generated by plot.py at 2018-02-27 10:38:30

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.67 Mbit/s (5.6% utilization)

95th percentile per-packet one-way delay: 11.520 ms

Loss rate: 19.38%

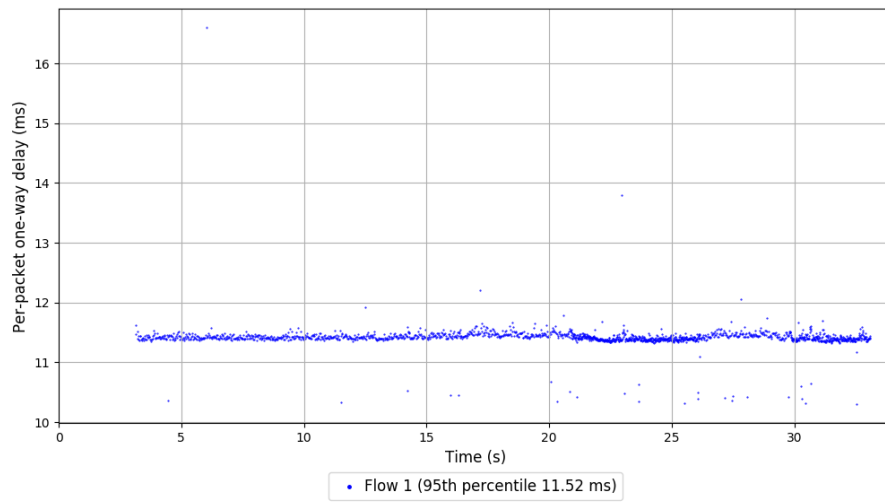
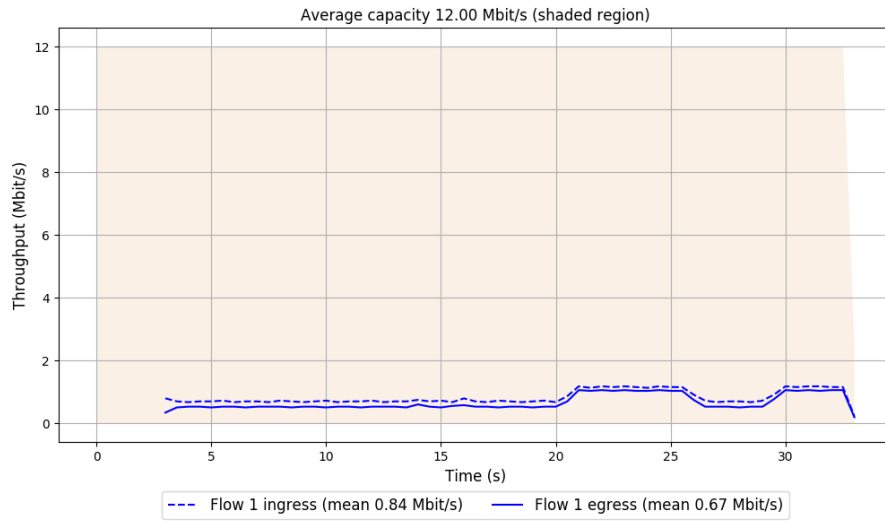
-- Flow 1:

Average throughput: 0.67 Mbit/s

95th percentile per-packet one-way delay: 11.520 ms

Loss rate: 19.38%

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



Run 6: Statistics of TCP Vegas

Start at: 2018-02-27 09:52:55

End at: 2018-02-27 09:53:25

# Below is generated by plot.py at 2018-02-27 10:38:30

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.52 Mbit/s (4.3% utilization)

95th percentile per-packet one-way delay: 11.901 ms

Loss rate: 25.53%

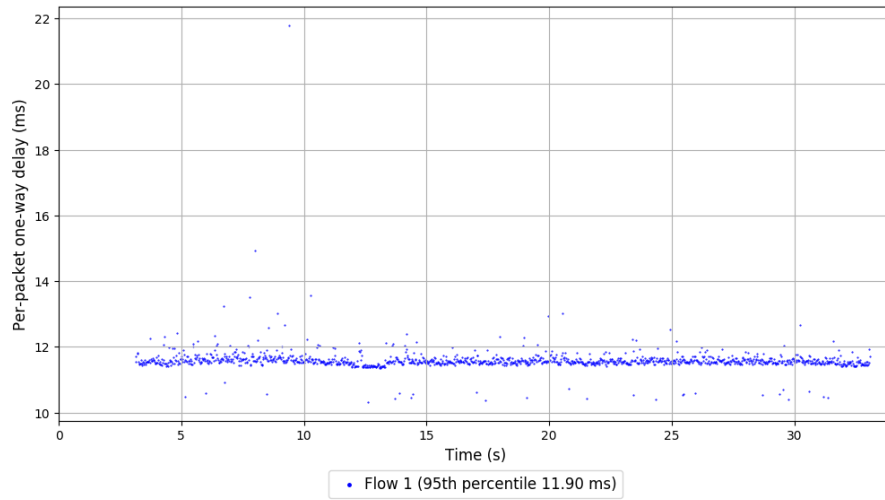
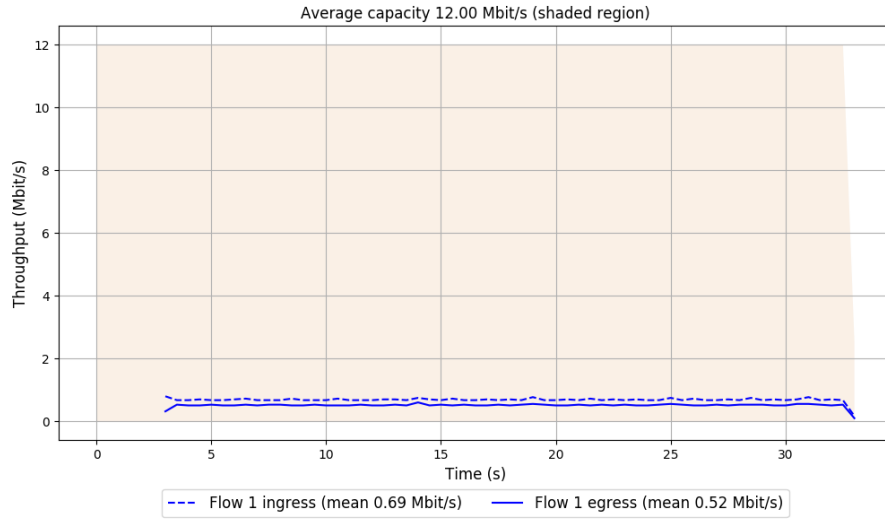
-- Flow 1:

Average throughput: 0.52 Mbit/s

95th percentile per-packet one-way delay: 11.901 ms

Loss rate: 25.53%

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



Run 7: Statistics of TCP Vegas

Start at: 2018-02-27 10:03:06

End at: 2018-02-27 10:03:36

# Below is generated by plot.py at 2018-02-27 10:38:31

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.61 Mbit/s (5.1% utilization)

95th percentile per-packet one-way delay: 11.504 ms

Loss rate: 21.97%

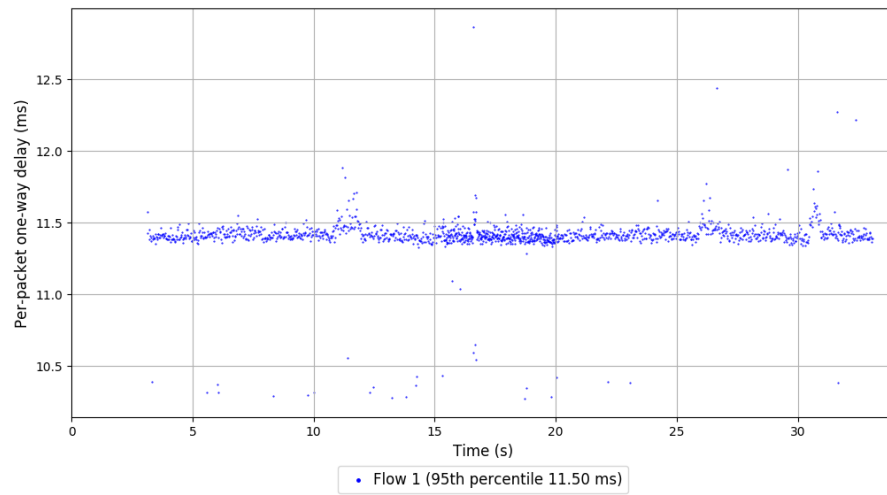
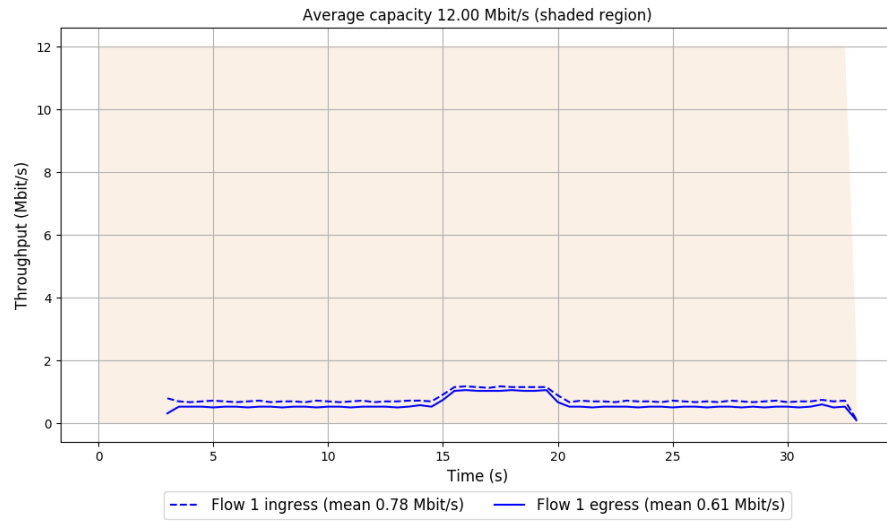
-- Flow 1:

Average throughput: 0.61 Mbit/s

95th percentile per-packet one-way delay: 11.504 ms

Loss rate: 21.97%

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



Run 8: Statistics of TCP Vegas

Start at: 2018-02-27 10:13:17

End at: 2018-02-27 10:13:47

# Below is generated by plot.py at 2018-02-27 10:38:33

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.54 Mbit/s (4.5% utilization)

95th percentile per-packet one-way delay: 11.478 ms

Loss rate: 24.87%

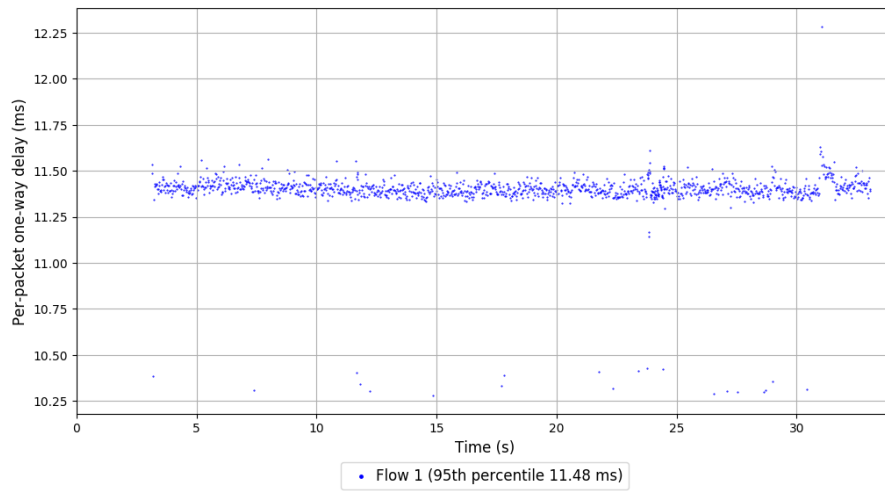
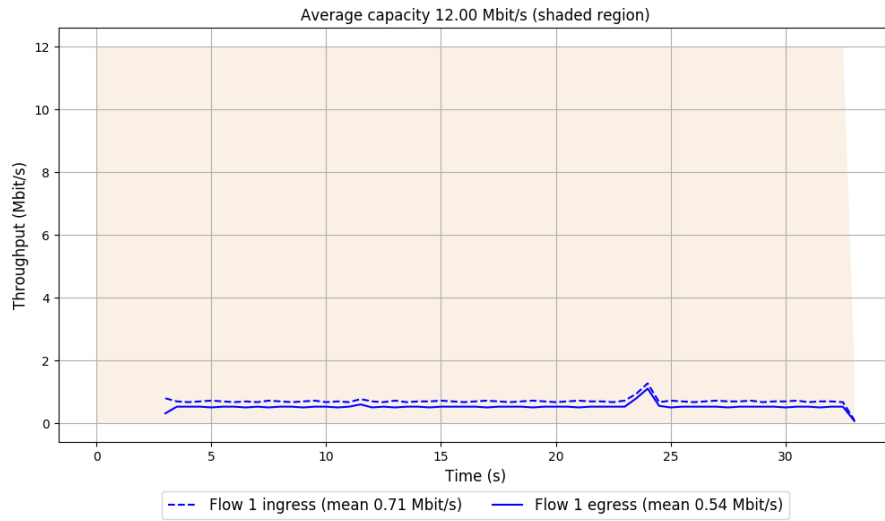
-- Flow 1:

Average throughput: 0.54 Mbit/s

95th percentile per-packet one-way delay: 11.478 ms

Loss rate: 24.87%

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



Run 9: Statistics of TCP Vegas

Start at: 2018-02-27 10:23:32

End at: 2018-02-27 10:24:02

# Below is generated by plot.py at 2018-02-27 10:38:35

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.84 Mbit/s (7.0% utilization)

95th percentile per-packet one-way delay: 11.713 ms

Loss rate: 14.46%

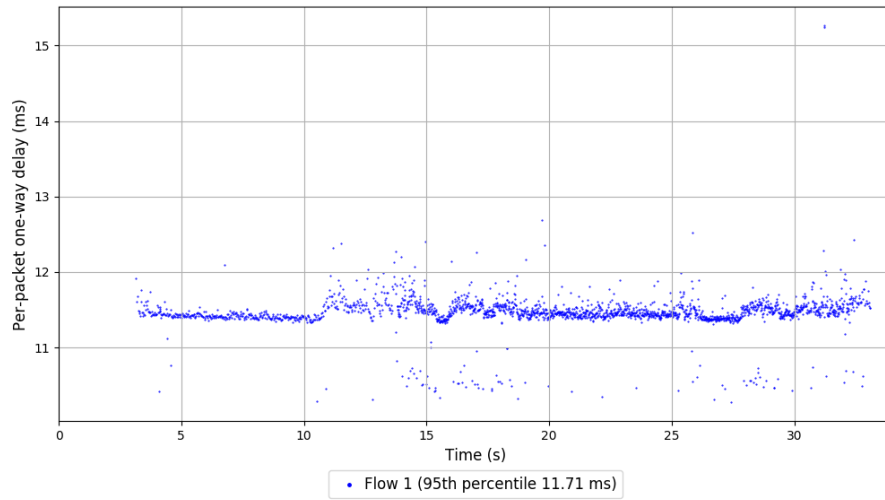
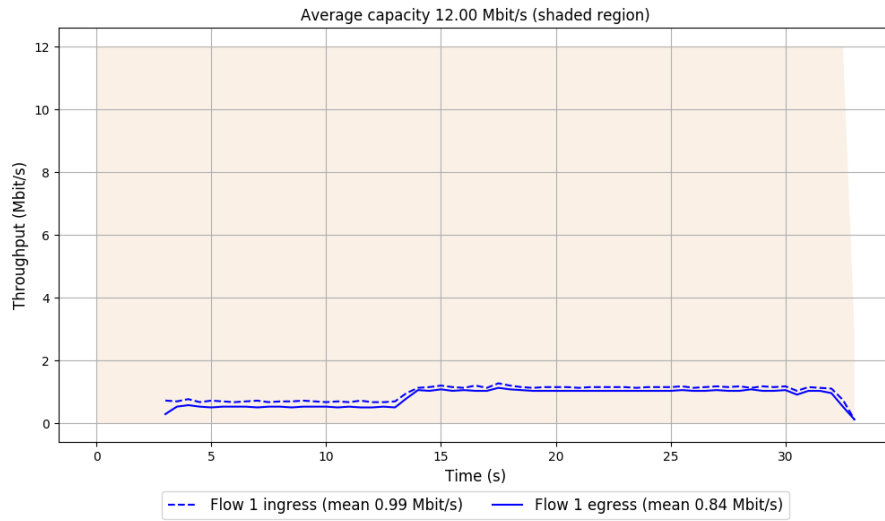
-- Flow 1:

Average throughput: 0.84 Mbit/s

95th percentile per-packet one-way delay: 11.713 ms

Loss rate: 14.46%

### Run 9: Report of TCP Vegas — Data Link



Run 10: Statistics of TCP Vegas

Start at: 2018-02-27 10:33:44

End at: 2018-02-27 10:34:14

# Below is generated by plot.py at 2018-02-27 10:38:35

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.97 Mbit/s (8.1% utilization)

95th percentile per-packet one-way delay: 11.587 ms

Loss rate: 11.68%

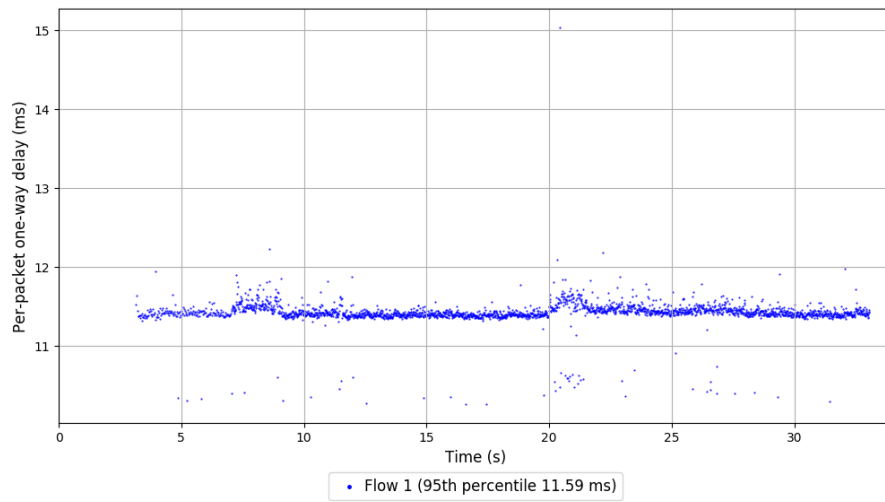
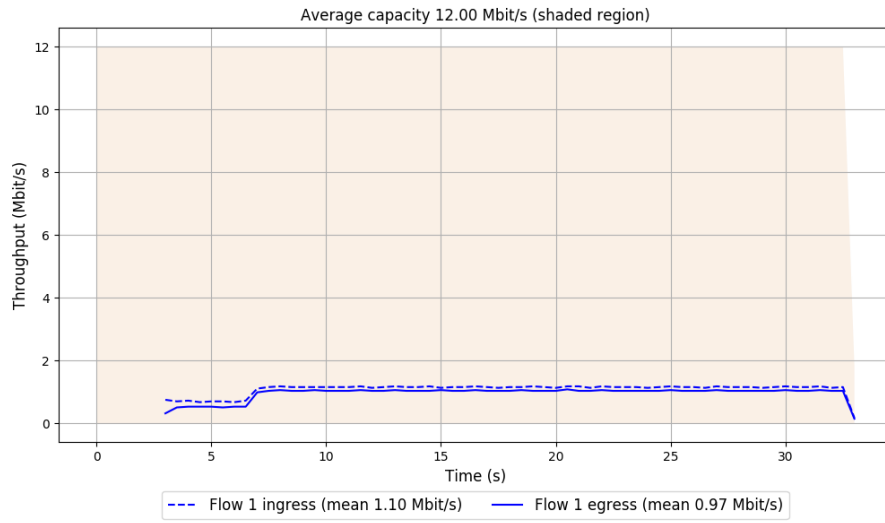
-- Flow 1:

Average throughput: 0.97 Mbit/s

95th percentile per-packet one-way delay: 11.587 ms

Loss rate: 11.68%

### Run 10: Report of TCP Vegas — Data Link



Run 1: Statistics of Verus

Start at: 2018-02-27 09:02:58

End at: 2018-02-27 09:03:28

# Below is generated by plot.py at 2018-02-27 10:38:49

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 1.60 Mbit/s (13.4% utilization)

95th percentile per-packet one-way delay: 12.239 ms

Loss rate: 97.28%

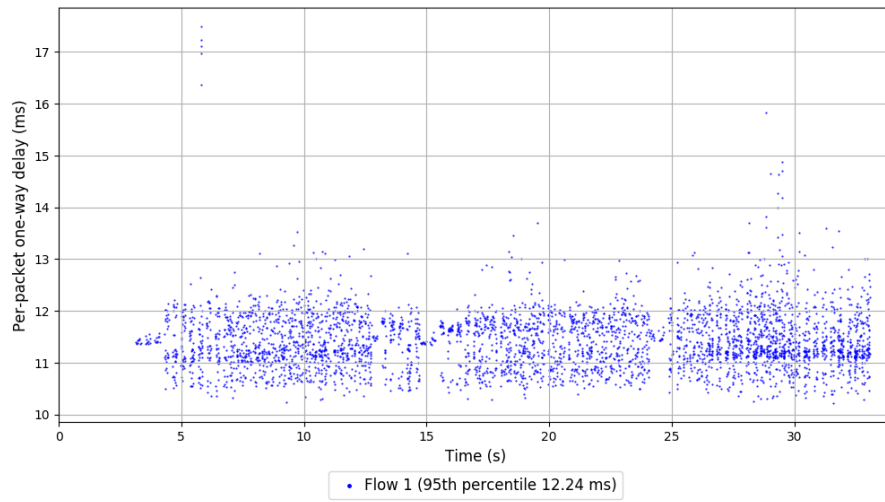
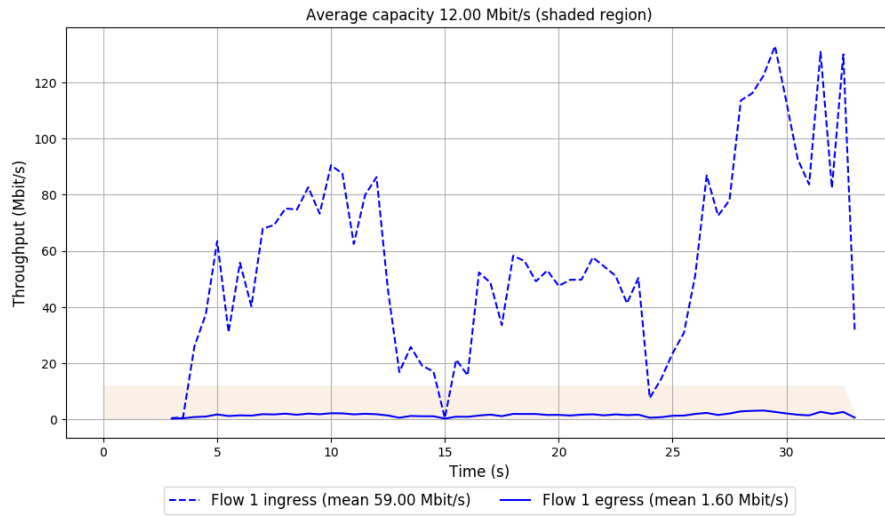
-- Flow 1:

Average throughput: 1.60 Mbit/s

95th percentile per-packet one-way delay: 12.239 ms

Loss rate: 97.28%

# Run 1: Report of Verus — Data Link



Run 2: Statistics of Verus

Start at: 2018-02-27 09:13:09

End at: 2018-02-27 09:13:39

# Below is generated by plot.py at 2018-02-27 10:38:58

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 1.99 Mbit/s (16.6% utilization)

95th percentile per-packet one-way delay: 12.245 ms

Loss rate: 97.81%

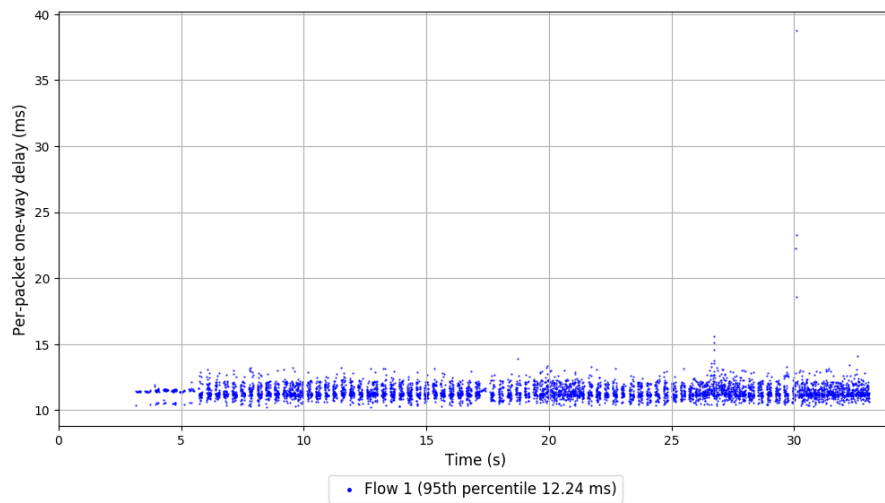
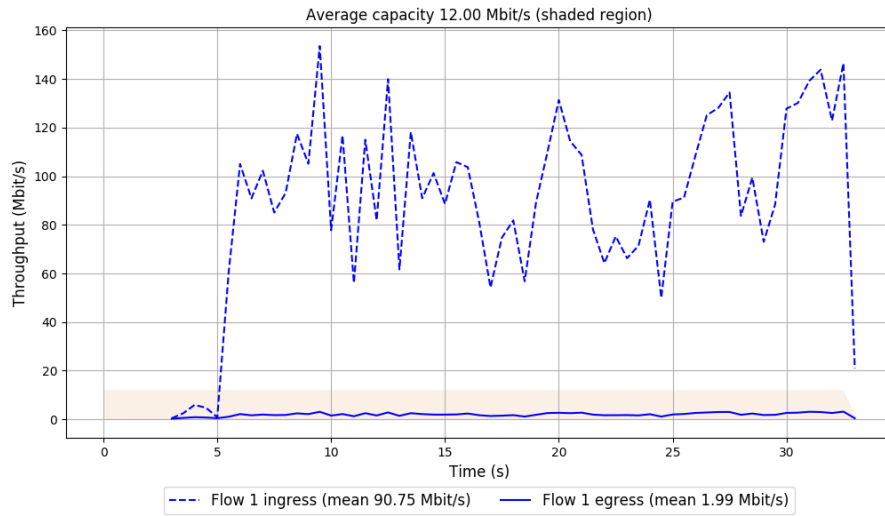
-- Flow 1:

Average throughput: 1.99 Mbit/s

95th percentile per-packet one-way delay: 12.245 ms

Loss rate: 97.81%

Run 2: Report of Verus — Data Link



Run 3: Statistics of Verus

Start at: 2018-02-27 09:23:21

End at: 2018-02-27 09:23:51

# Below is generated by plot.py at 2018-02-27 10:40:13

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 3.85 Mbit/s (32.1% utilization)

95th percentile per-packet one-way delay: 12.117 ms

Loss rate: 98.84%

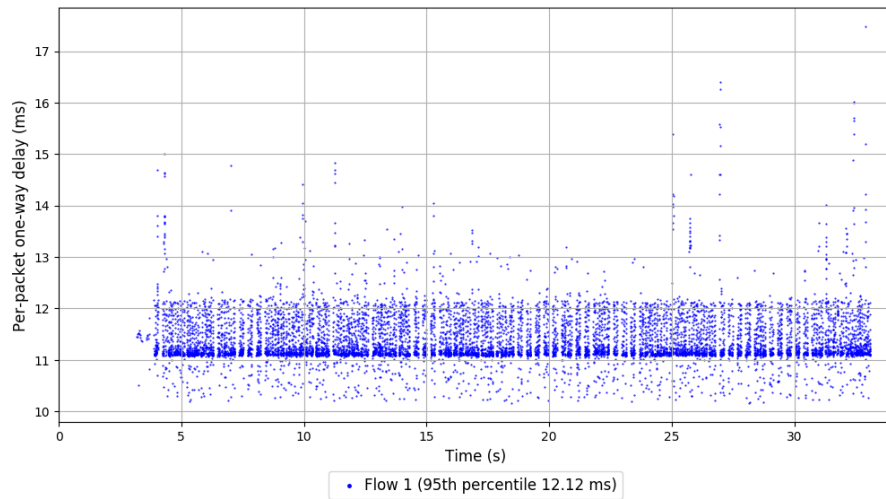
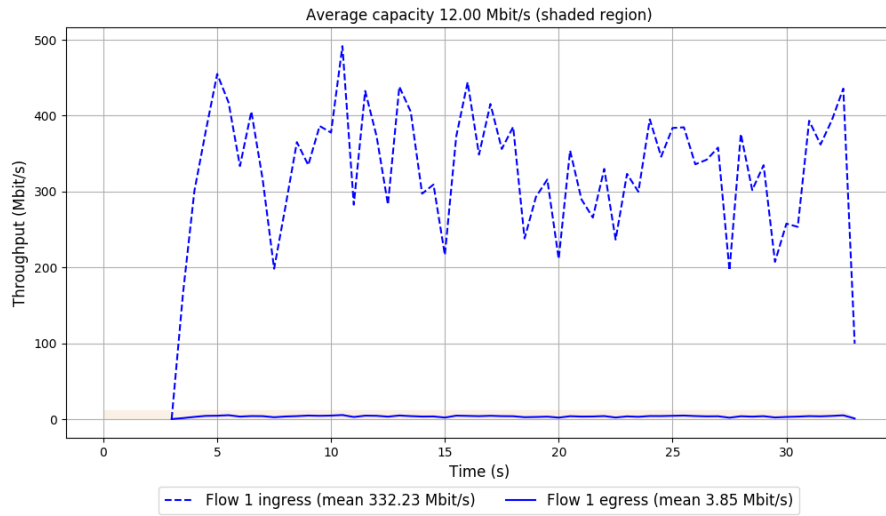
-- Flow 1:

Average throughput: 3.85 Mbit/s

95th percentile per-packet one-way delay: 12.117 ms

Loss rate: 98.84%

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



Run 4: Statistics of Verus

Start at: 2018-02-27 09:33:35

End at: 2018-02-27 09:34:05

# Below is generated by plot.py at 2018-02-27 10:40:13

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 3.86 Mbit/s (32.2% utilization)

95th percentile per-packet one-way delay: 12.445 ms

Loss rate: 98.78%

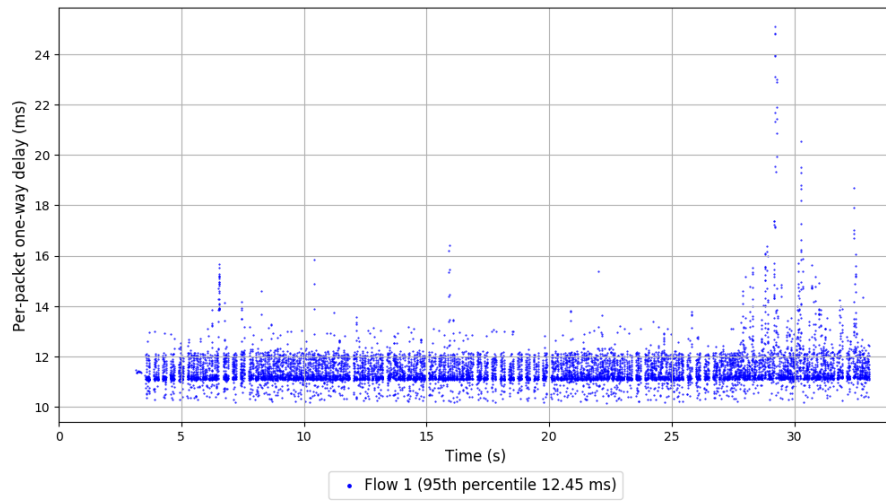
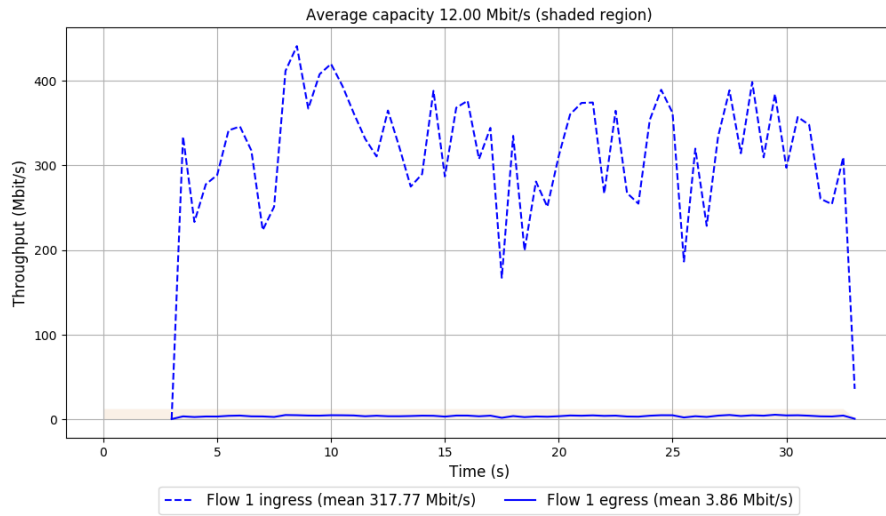
-- Flow 1:

Average throughput: 3.86 Mbit/s

95th percentile per-packet one-way delay: 12.445 ms

Loss rate: 98.78%

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



Run 5: Statistics of Verus

Start at: 2018-02-27 09:43:50

End at: 2018-02-27 09:44:20

# Below is generated by plot.py at 2018-02-27 10:40:13

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 2.25 Mbit/s (18.7% utilization)

95th percentile per-packet one-way delay: 12.232 ms

Loss rate: 98.57%

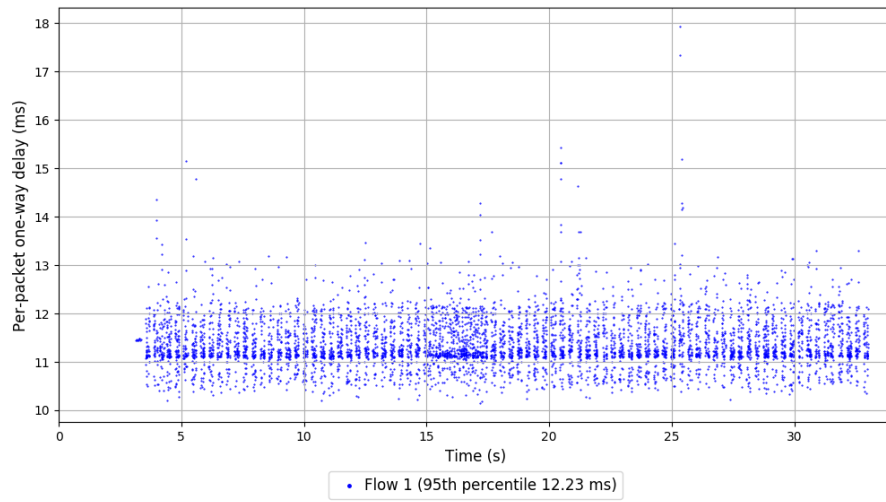
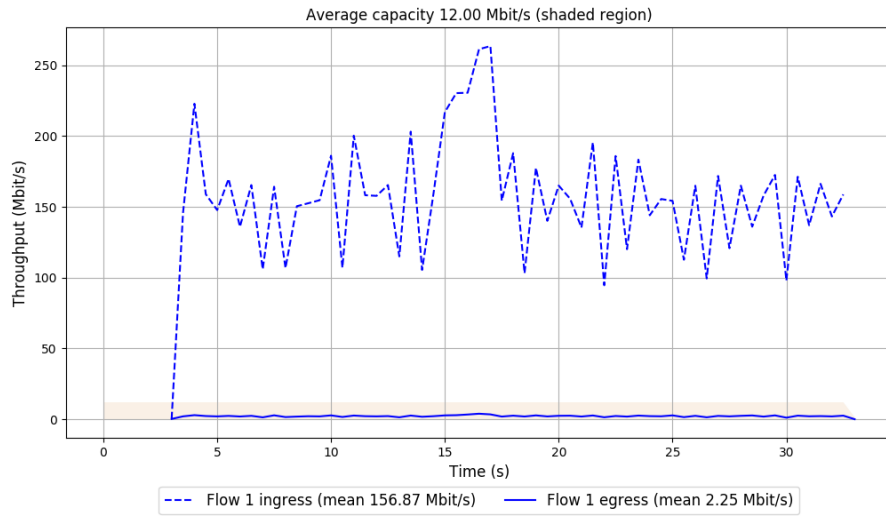
-- Flow 1:

Average throughput: 2.25 Mbit/s

95th percentile per-packet one-way delay: 12.232 ms

Loss rate: 98.57%

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



Run 6: Statistics of Verus

Start at: 2018-02-27 09:54:03

End at: 2018-02-27 09:54:33

# Below is generated by plot.py at 2018-02-27 10:40:13

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 1.92 Mbit/s (16.0% utilization)

95th percentile per-packet one-way delay: 12.255 ms

Loss rate: 98.03%

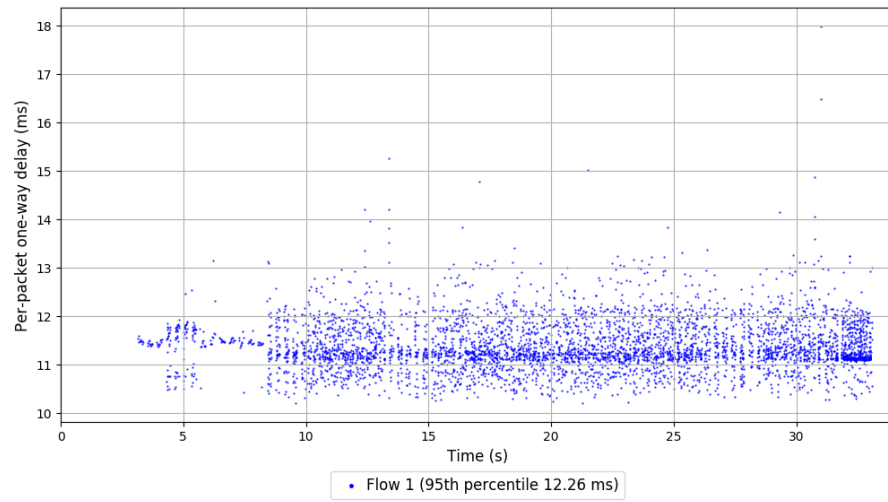
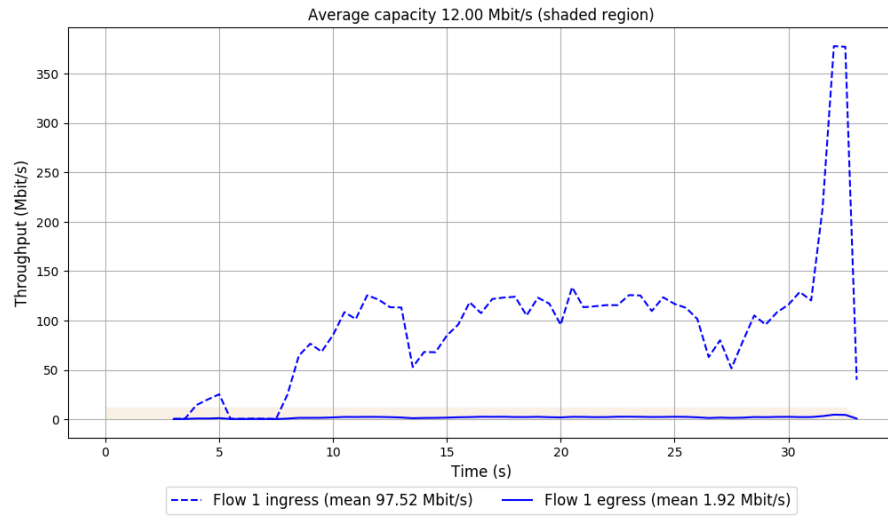
-- Flow 1:

Average throughput: 1.92 Mbit/s

95th percentile per-packet one-way delay: 12.255 ms

Loss rate: 98.03%

## Run 6: Report of Verus — Data Link



Run 7: Statistics of Verus

Start at: 2018-02-27 10:04:13

End at: 2018-02-27 10:04:43

# Below is generated by plot.py at 2018-02-27 10:40:13

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 1.60 Mbit/s (13.3% utilization)

95th percentile per-packet one-way delay: 12.220 ms

Loss rate: 97.61%

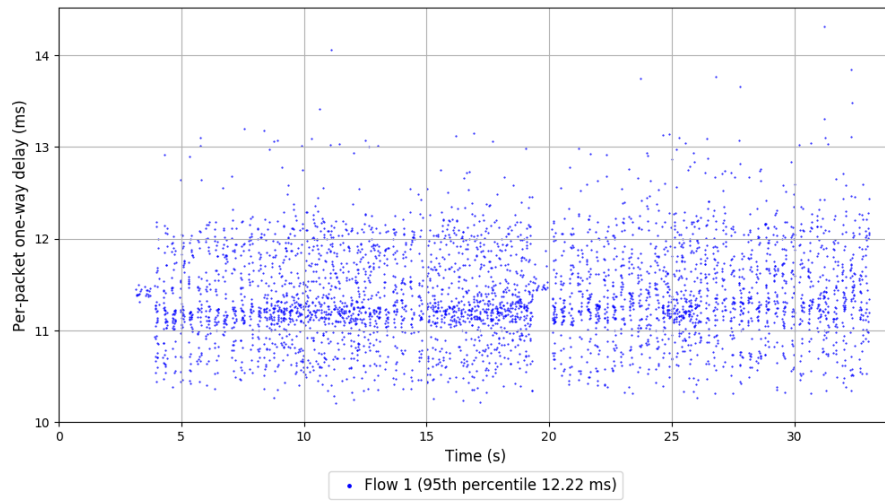
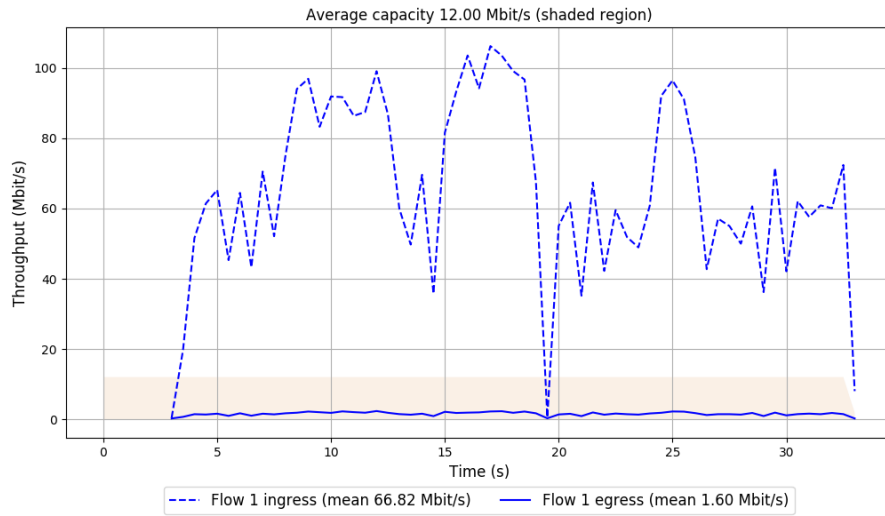
-- Flow 1:

Average throughput: 1.60 Mbit/s

95th percentile per-packet one-way delay: 12.220 ms

Loss rate: 97.61%

### Run 7: Report of Verus — Data Link



Run 8: Statistics of Verus

Start at: 2018-02-27 10:14:24

End at: 2018-02-27 10:14:55

# Below is generated by plot.py at 2018-02-27 10:40:17

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 3.89 Mbit/s (32.4% utilization)

95th percentile per-packet one-way delay: 12.483 ms

Loss rate: 98.83%

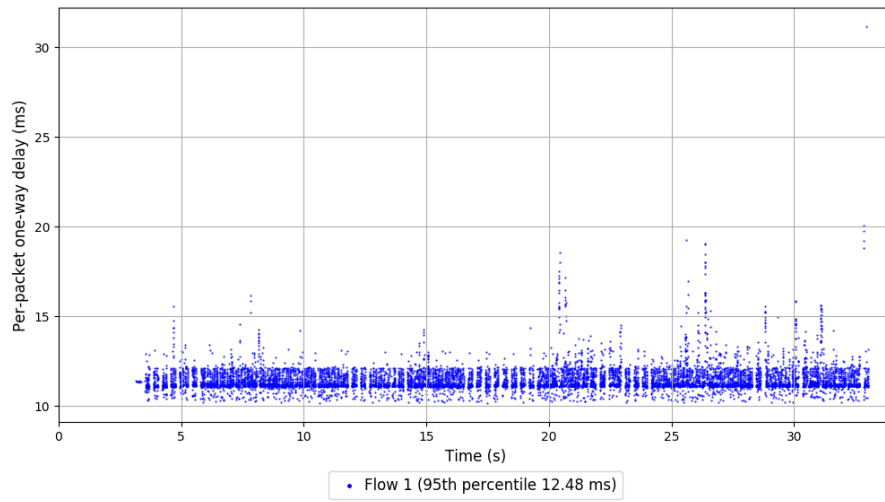
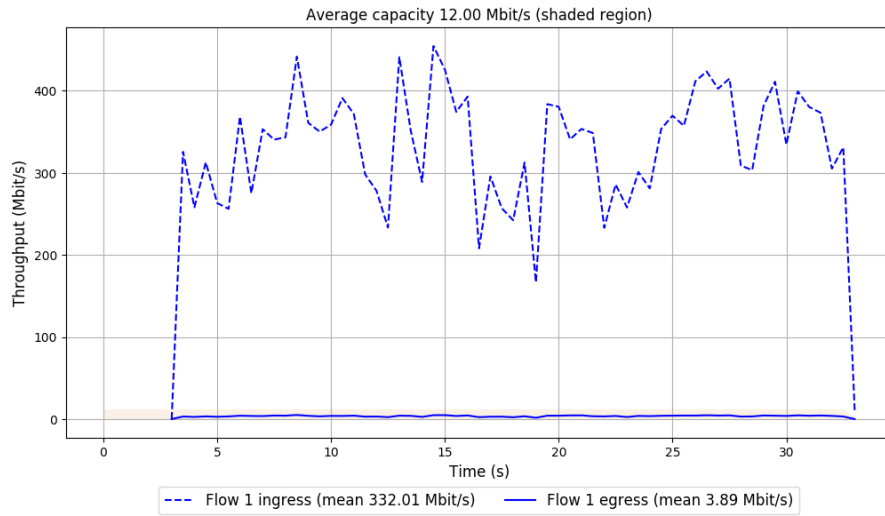
-- Flow 1:

Average throughput: 3.89 Mbit/s

95th percentile per-packet one-way delay: 12.483 ms

Loss rate: 98.83%

### Run 8: Report of Verus — Data Link



Run 9: Statistics of Verus

Start at: 2018-02-27 10:24:39

End at: 2018-02-27 10:25:09

# Below is generated by plot.py at 2018-02-27 10:40:17

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 2.07 Mbit/s (17.3% utilization)

95th percentile per-packet one-way delay: 12.334 ms

Loss rate: 98.10%

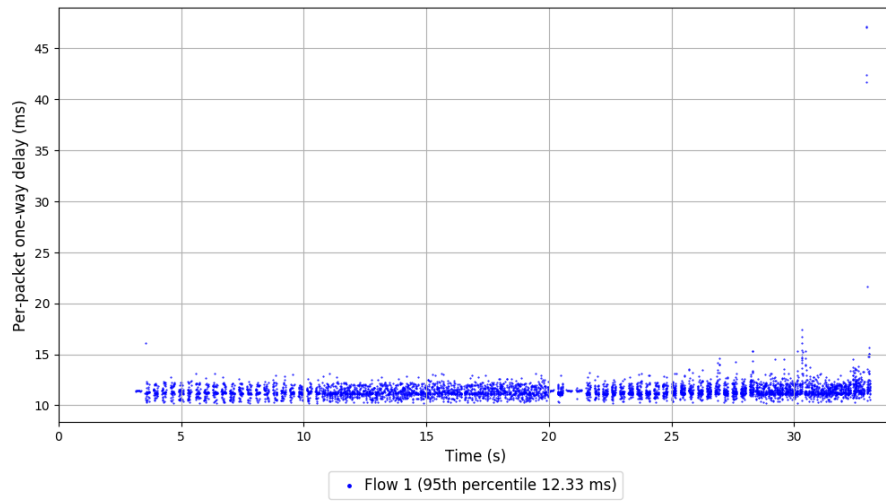
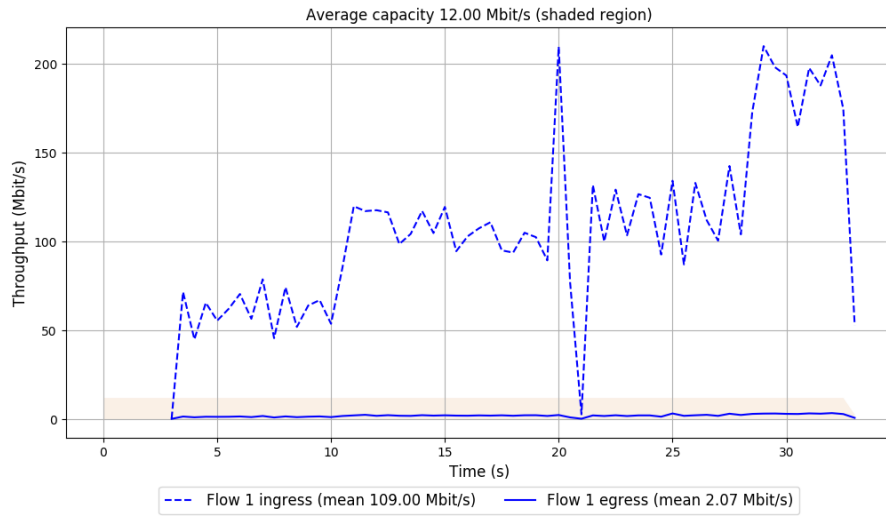
-- Flow 1:

Average throughput: 2.07 Mbit/s

95th percentile per-packet one-way delay: 12.334 ms

Loss rate: 98.10%

### Run 9: Report of Verus — Data Link



Run 10: Statistics of Verus

Start at: 2018-02-27 10:34:51

End at: 2018-02-27 10:35:21

# Below is generated by plot.py at 2018-02-27 10:40:52

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 3.83 Mbit/s (31.9% utilization)

95th percentile per-packet one-way delay: 12.137 ms

Loss rate: 98.85%

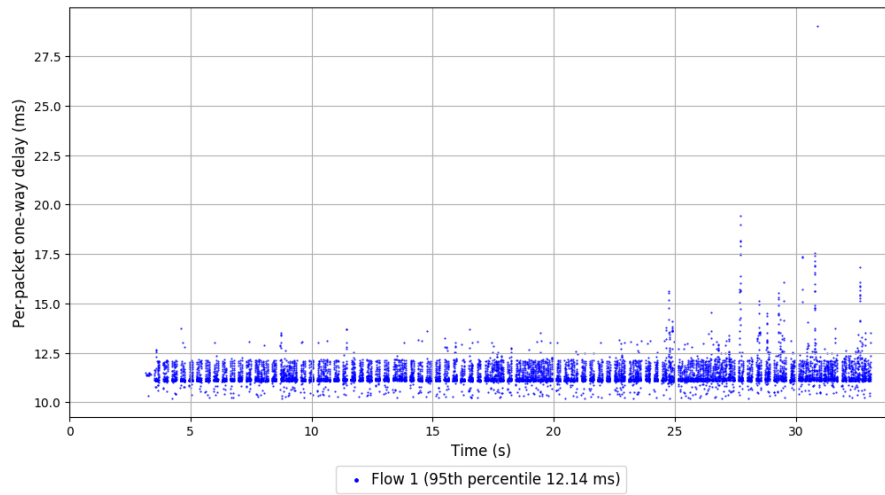
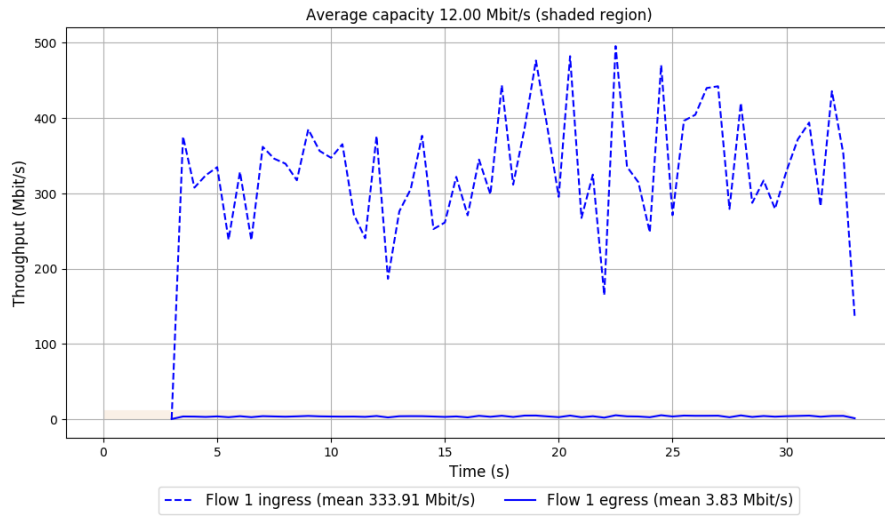
-- Flow 1:

Average throughput: 3.83 Mbit/s

95th percentile per-packet one-way delay: 12.137 ms

Loss rate: 98.85%

# Run 10: Report of Verus — Data Link



Run 1: Statistics of Copa

Start at: 2018-02-27 09:02:25

End at: 2018-02-27 09:02:55

# Below is generated by plot.py at 2018-02-27 10:40:52

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.01 Mbit/s (0.1% utilization)

95th percentile per-packet one-way delay: 11.888 ms

Loss rate: 94.36%

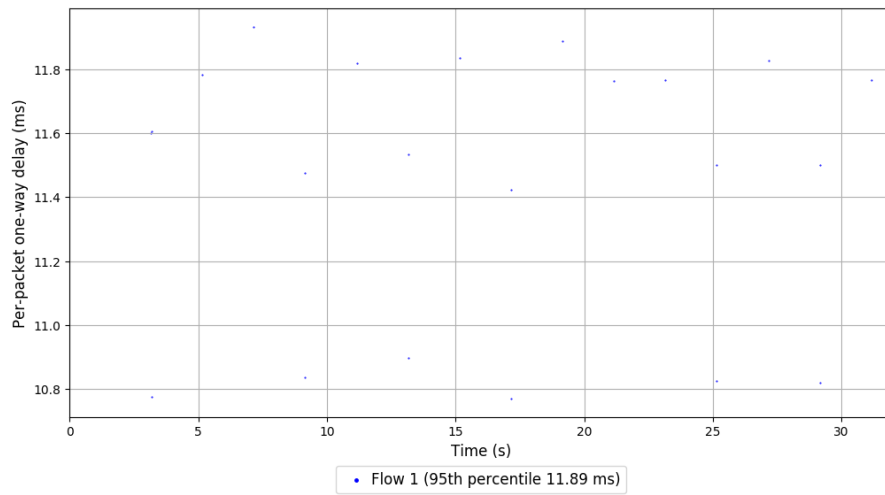
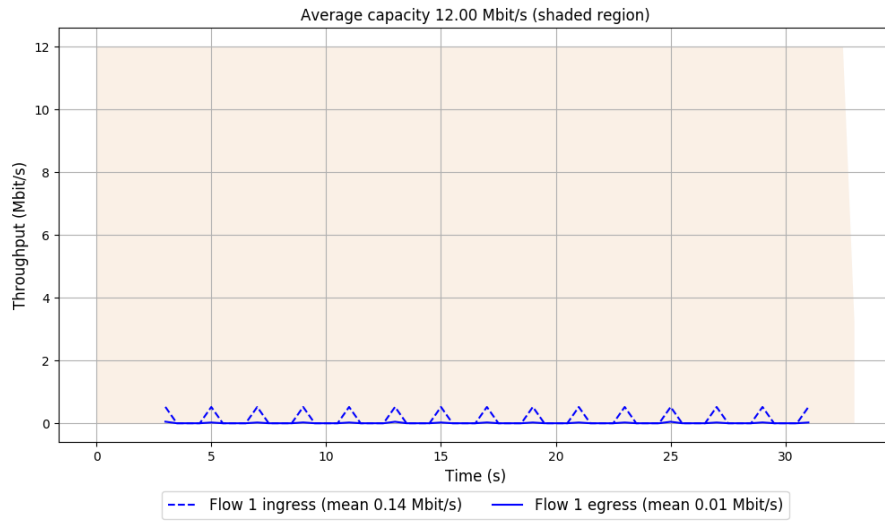
-- Flow 1:

Average throughput: 0.01 Mbit/s

95th percentile per-packet one-way delay: 11.888 ms

Loss rate: 94.36%

# Run 1: Report of Copa — Data Link



Run 2: Statistics of Copa

Start at: 2018-02-27 09:12:35

End at: 2018-02-27 09:13:05

# Below is generated by plot.py at 2018-02-27 10:40:52

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.01 Mbit/s (0.1% utilization)

95th percentile per-packet one-way delay: 11.696 ms

Loss rate: 93.36%

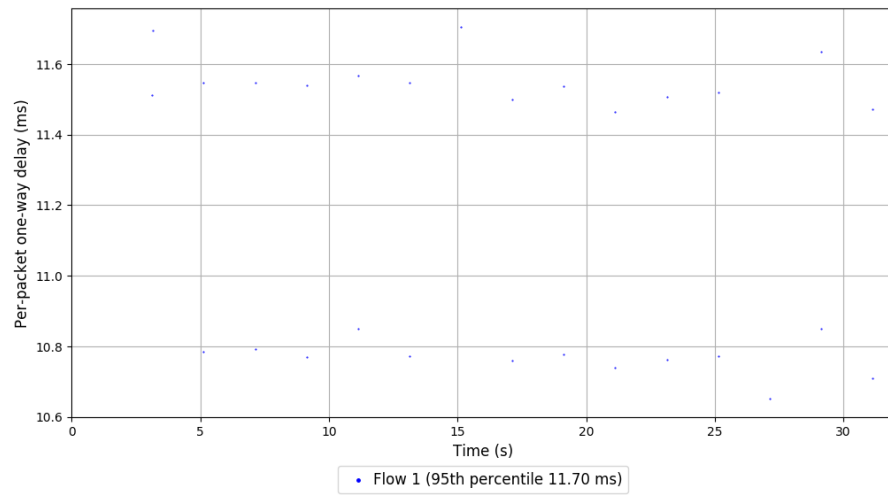
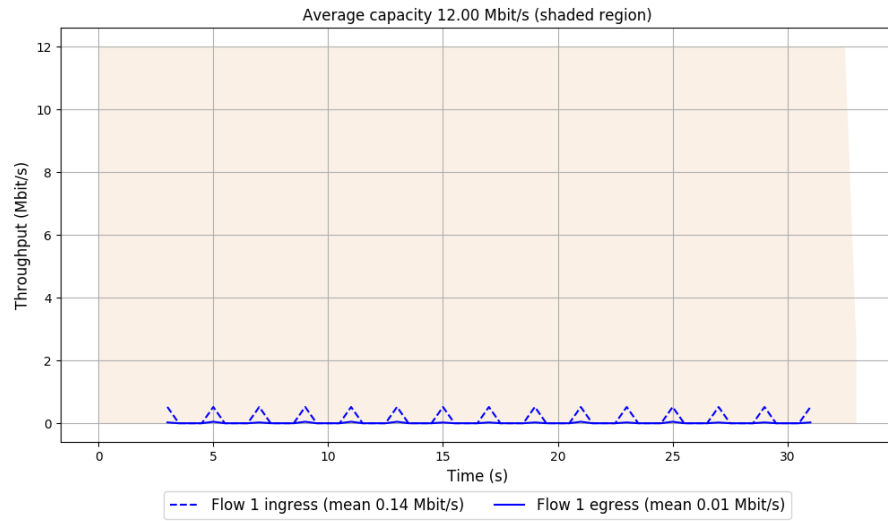
-- Flow 1:

Average throughput: 0.01 Mbit/s

95th percentile per-packet one-way delay: 11.696 ms

Loss rate: 93.36%

## Run 2: Report of Copa — Data Link



Run 3: Statistics of Copa

Start at: 2018-02-27 09:22:47

End at: 2018-02-27 09:23:17

# Below is generated by plot.py at 2018-02-27 10:40:52

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.01 Mbit/s (0.1% utilization)

95th percentile per-packet one-way delay: 11.735 ms

Loss rate: 93.30%

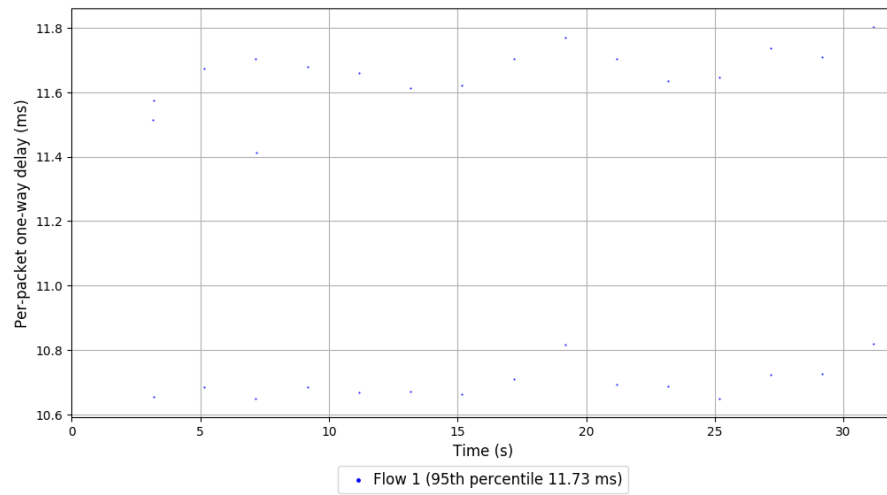
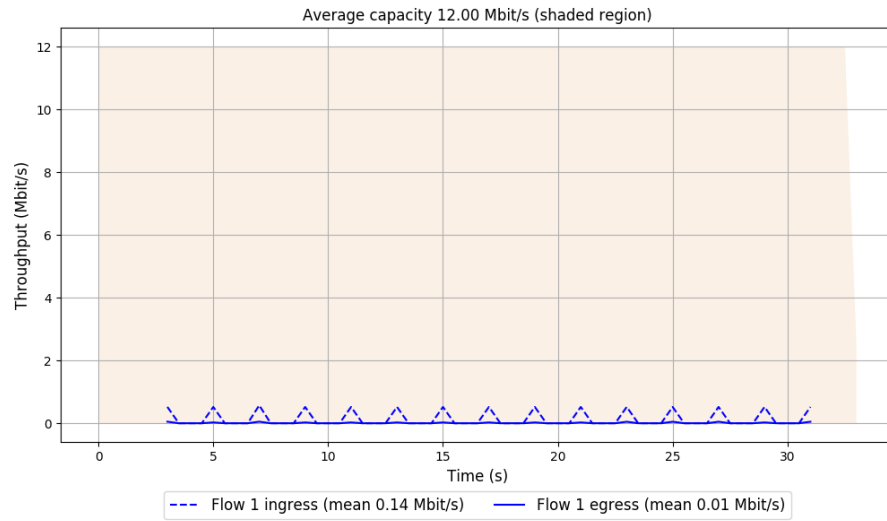
-- Flow 1:

Average throughput: 0.01 Mbit/s

95th percentile per-packet one-way delay: 11.735 ms

Loss rate: 93.30%

### Run 3: Report of Copa — Data Link



Run 4: Statistics of Copa

Start at: 2018-02-27 09:33:02

End at: 2018-02-27 09:33:32

# Below is generated by plot.py at 2018-02-27 10:40:52

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.01 Mbit/s (0.1% utilization)

95th percentile per-packet one-way delay: 11.748 ms

Loss rate: 94.61%

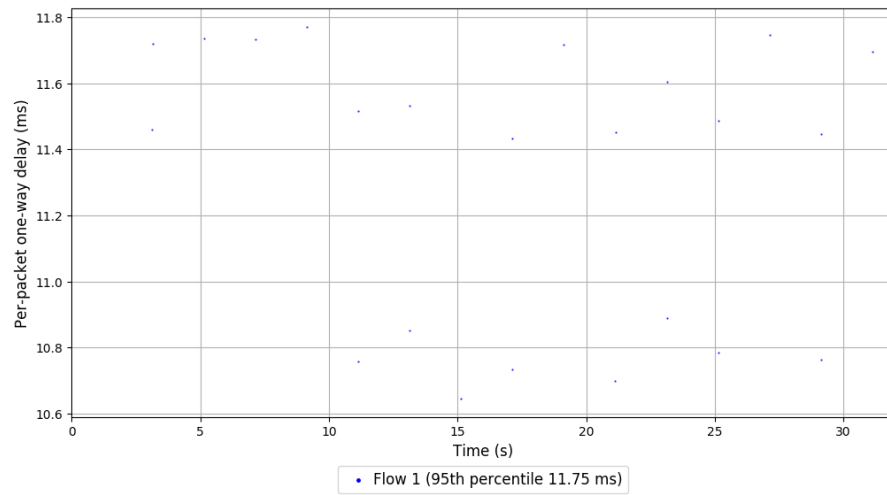
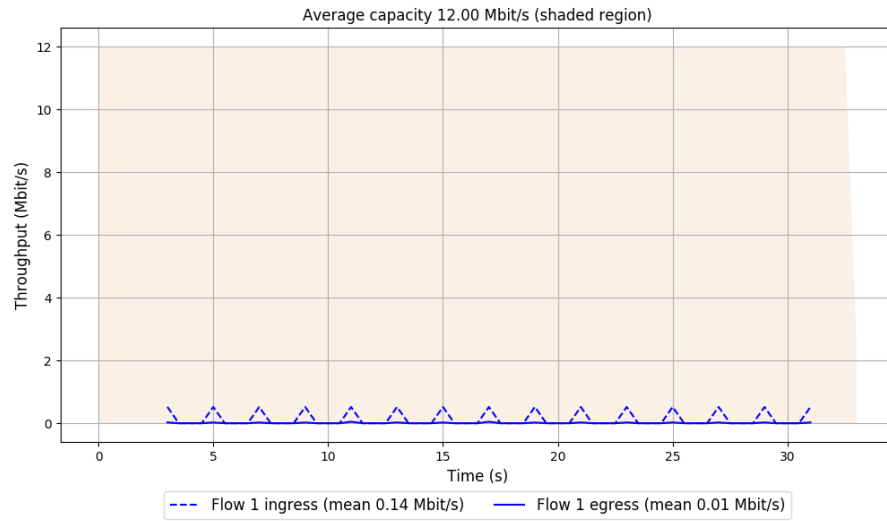
-- Flow 1:

Average throughput: 0.01 Mbit/s

95th percentile per-packet one-way delay: 11.748 ms

Loss rate: 94.61%

### Run 4: Report of Copa — Data Link

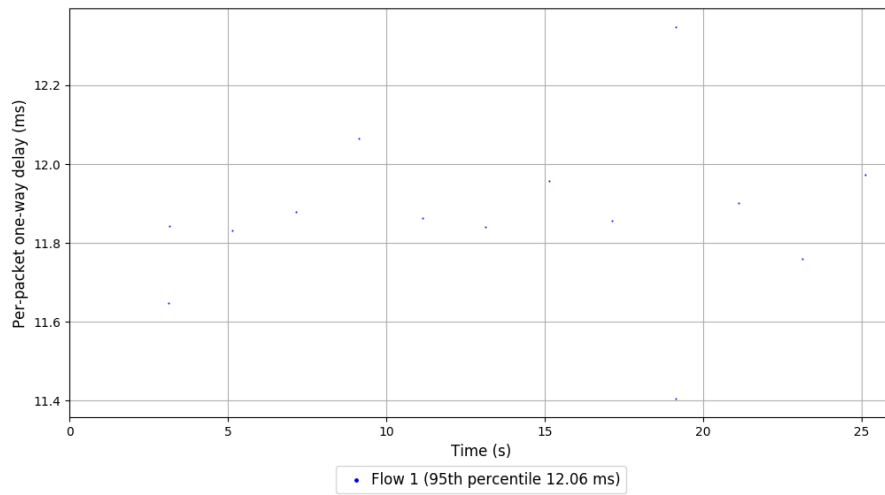
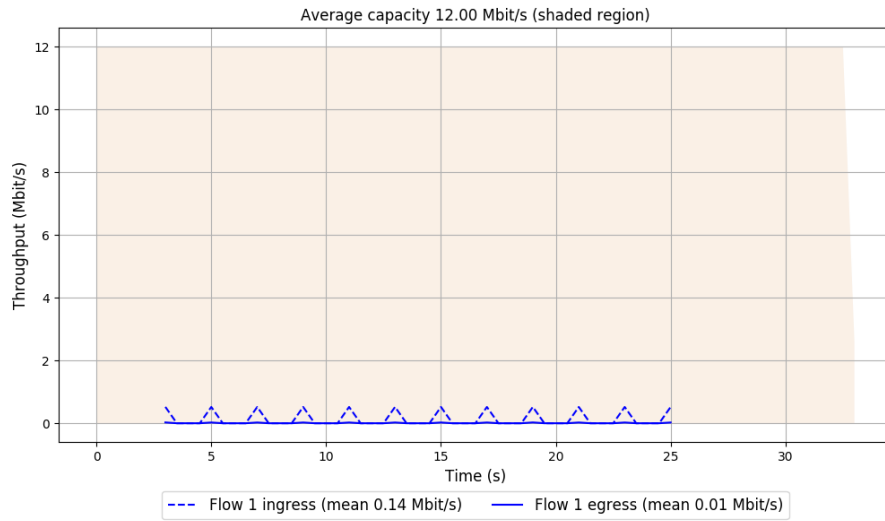


Run 5: Statistics of Copa

Start at: 2018-02-27 09:43:17

End at: 2018-02-27 09:43:47

### Run 5: Report of Copa — Data Link



Run 6: Statistics of Copa

Start at: 2018-02-27 09:53:29

End at: 2018-02-27 09:53:59

# Below is generated by plot.py at 2018-02-27 10:40:52

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.01 Mbit/s (0.1% utilization)

95th percentile per-packet one-way delay: 12.189 ms

Loss rate: 95.36%

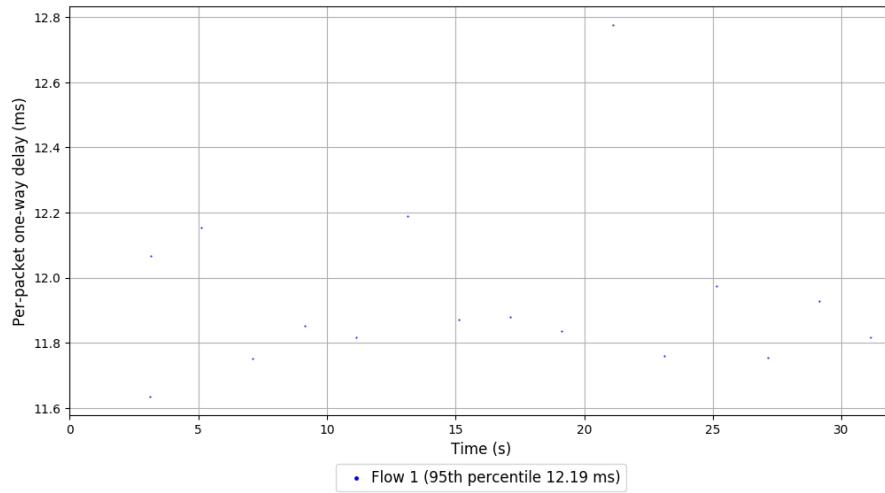
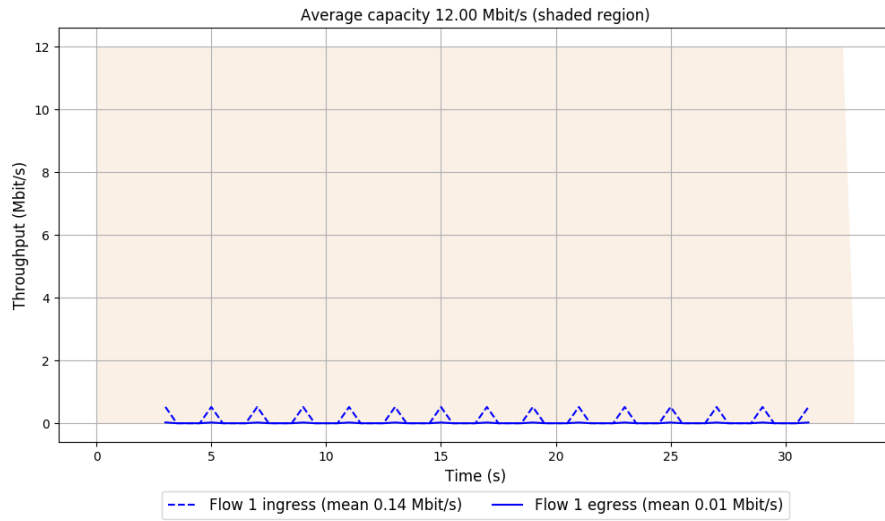
-- Flow 1:

Average throughput: 0.01 Mbit/s

95th percentile per-packet one-way delay: 12.189 ms

Loss rate: 95.36%

### Run 6: Report of Copa — Data Link



Run 7: Statistics of Copa

Start at: 2018-02-27 10:03:40

End at: 2018-02-27 10:04:10

# Below is generated by plot.py at 2018-02-27 10:40:52

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.01 Mbit/s (0.1% utilization)

95th percentile per-packet one-way delay: 11.840 ms

Loss rate: 95.36%

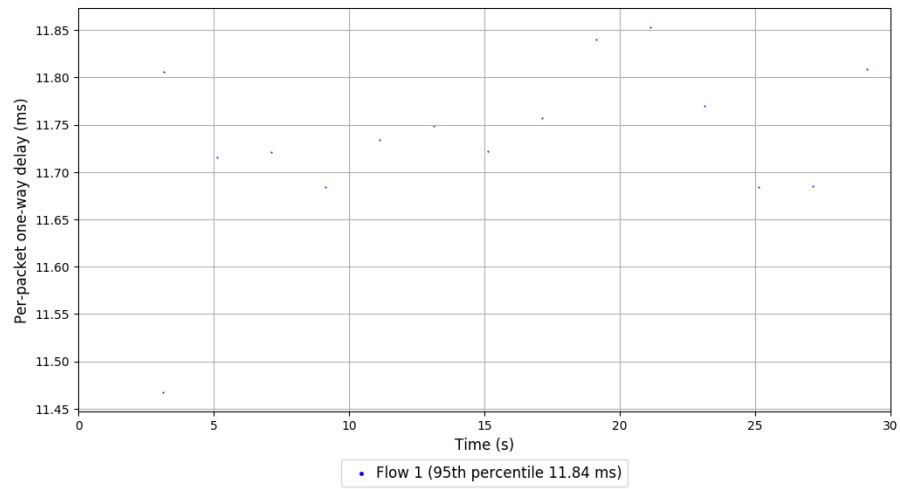
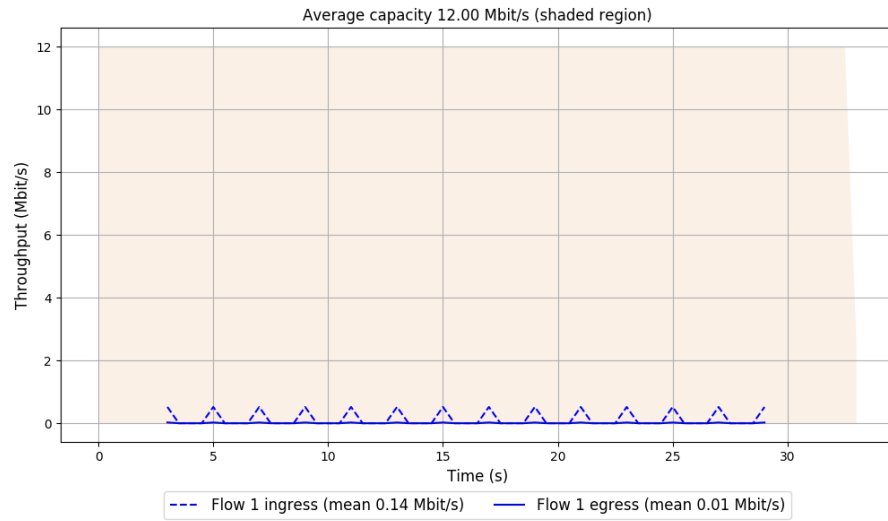
-- Flow 1:

Average throughput: 0.01 Mbit/s

95th percentile per-packet one-way delay: 11.840 ms

Loss rate: 95.36%

### Run 7: Report of Copa — Data Link



Run 8: Statistics of Copa

Start at: 2018-02-27 10:13:51

End at: 2018-02-27 10:14:21

# Below is generated by plot.py at 2018-02-27 10:40:52

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.01 Mbit/s (0.1% utilization)

95th percentile per-packet one-way delay: 11.857 ms

Loss rate: 95.36%

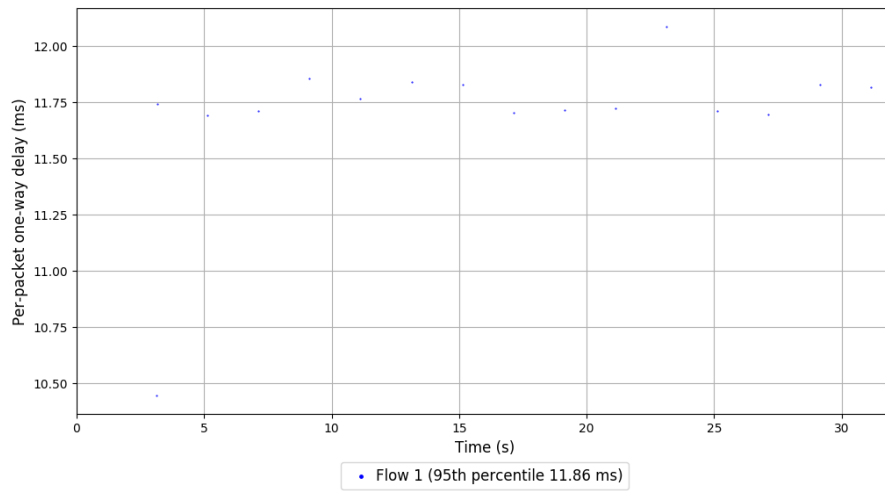
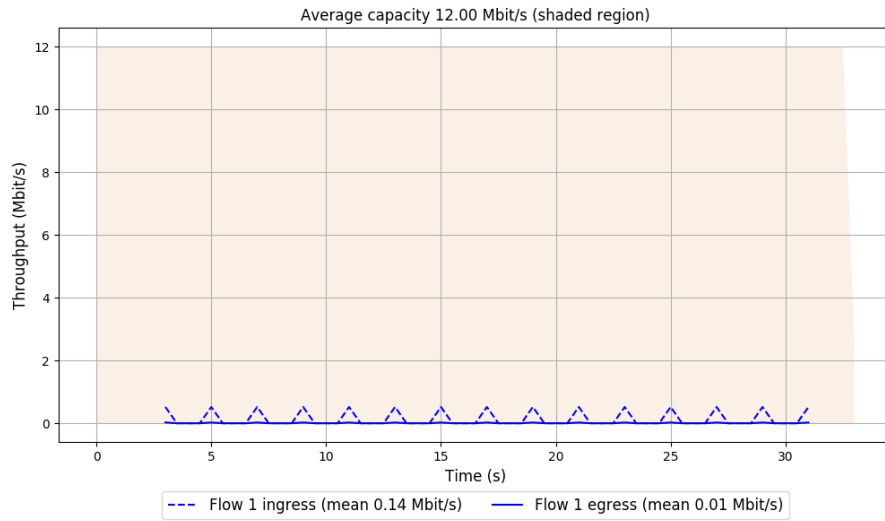
-- Flow 1:

Average throughput: 0.01 Mbit/s

95th percentile per-packet one-way delay: 11.857 ms

Loss rate: 95.36%

### Run 8: Report of Copa — Data Link



Run 9: Statistics of Copa

Start at: 2018-02-27 10:24:06

End at: 2018-02-27 10:24:36

# Below is generated by plot.py at 2018-02-27 10:40:52

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 0.01 Mbit/s (0.1% utilization)

95th percentile per-packet one-way delay: 11.888 ms

Loss rate: 95.36%

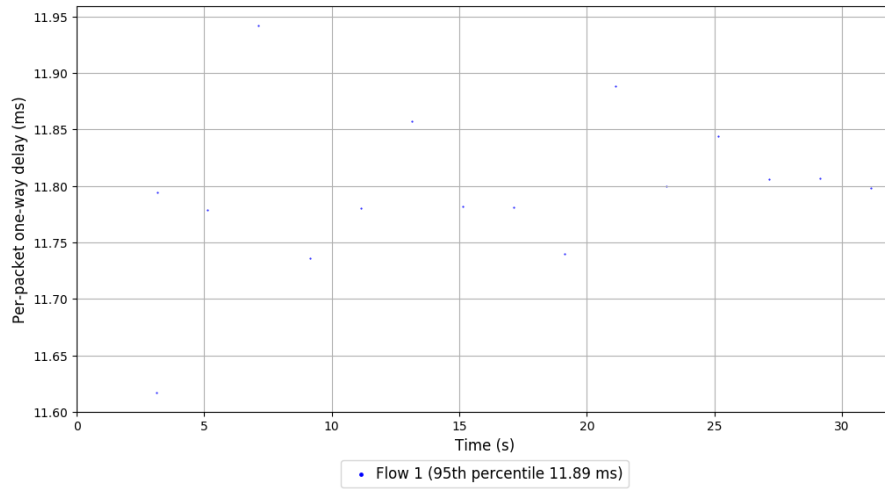
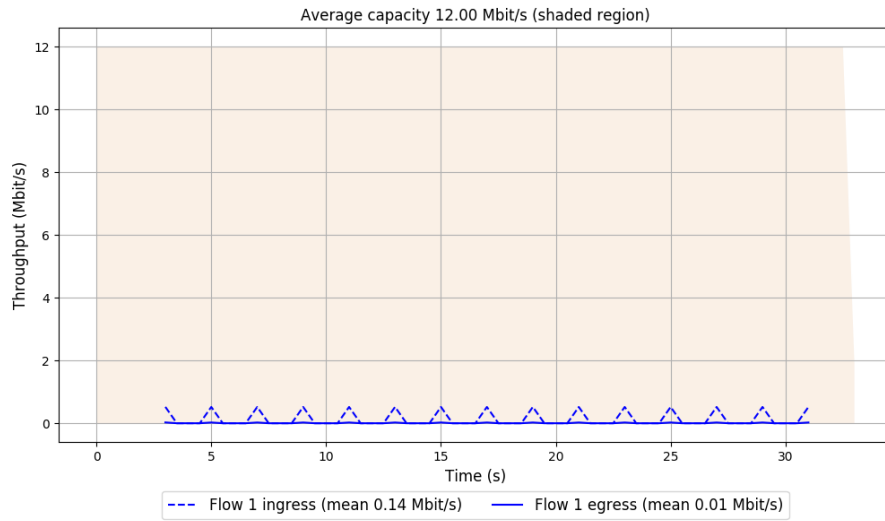
-- Flow 1:

Average throughput: 0.01 Mbit/s

95th percentile per-packet one-way delay: 11.888 ms

Loss rate: 95.36%

### Run 9: Report of Copa — Data Link

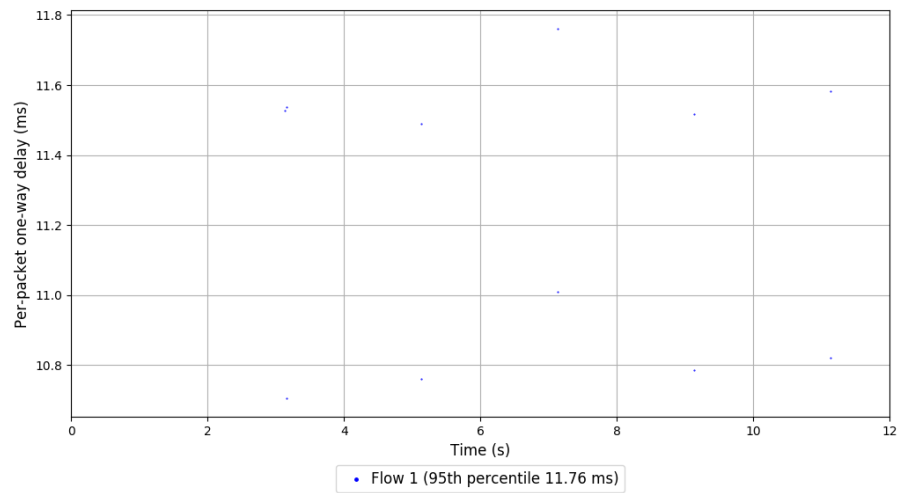
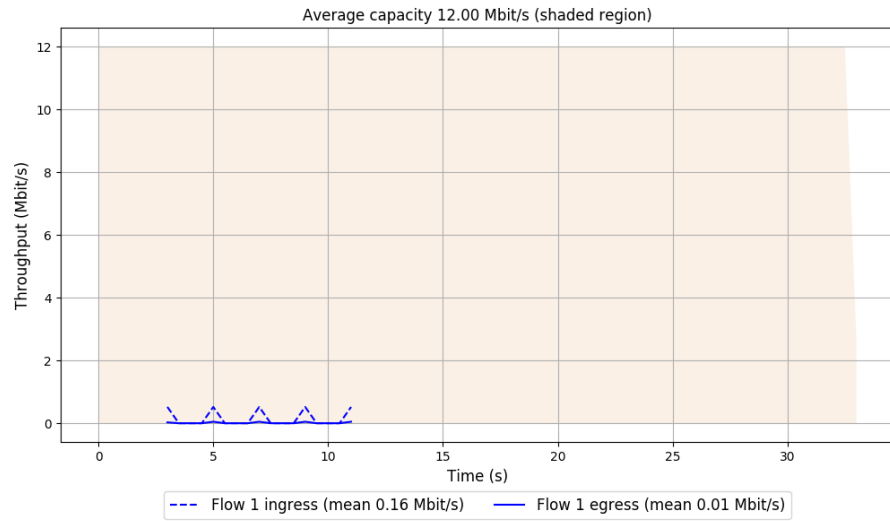


Run 10: Statistics of Copa

Start at: 2018-02-27 10:34:17

End at: 2018-02-27 10:34:47

### Run 10: Report of Copa — Data Link



Run 1: Statistics of FillP

Start at: 2018-02-27 08:54:30

End at: 2018-02-27 08:55:00

# Below is generated by plot.py at 2018-02-27 10:40:52

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 1.99 Mbit/s (16.6% utilization)

95th percentile per-packet one-way delay: 11.954 ms

Loss rate: 90.23%

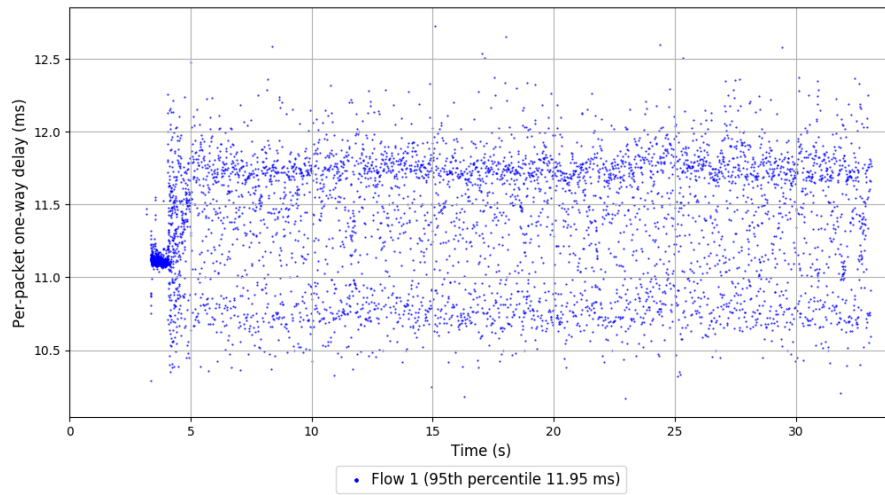
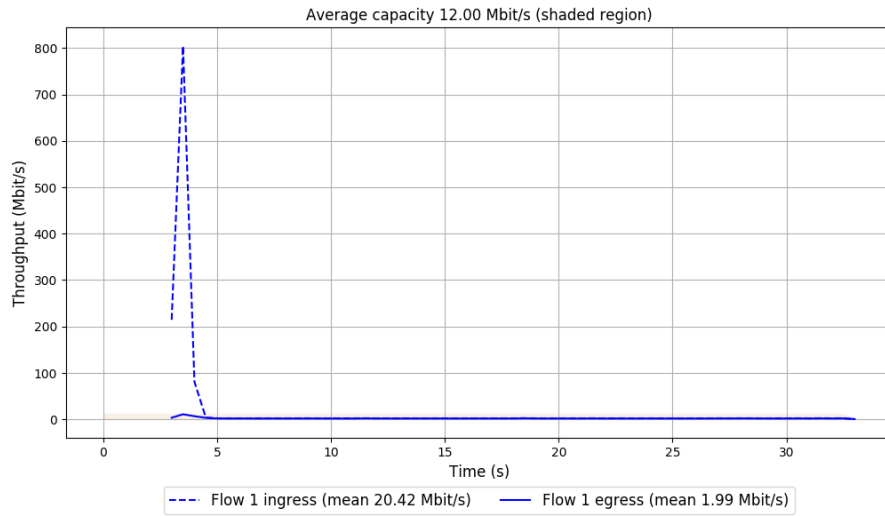
-- Flow 1:

Average throughput: 1.99 Mbit/s

95th percentile per-packet one-way delay: 11.954 ms

Loss rate: 90.23%

# Run 1: Report of FillP — Data Link



Run 2: Statistics of FillP

Start at: 2018-02-27 09:04:41

End at: 2018-02-27 09:05:11

# Below is generated by plot.py at 2018-02-27 10:40:52

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 1.88 Mbit/s (15.7% utilization)

95th percentile per-packet one-way delay: 11.970 ms

Loss rate: 81.40%

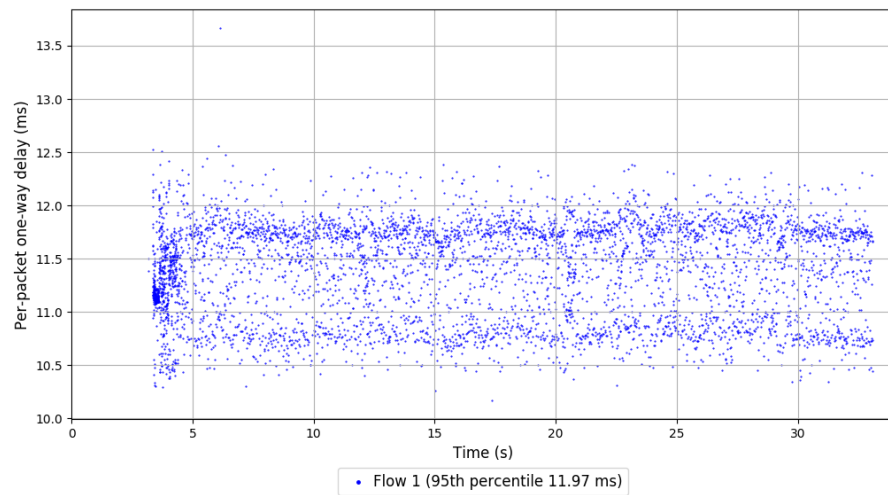
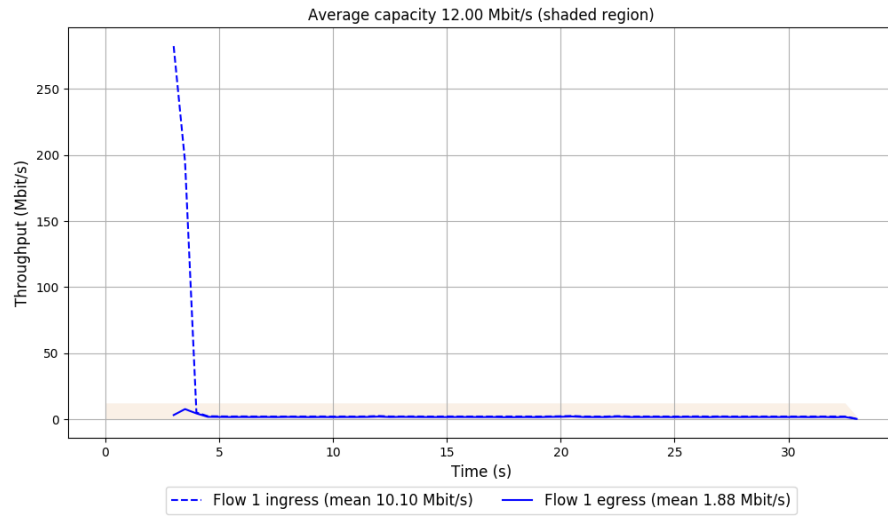
-- Flow 1:

Average throughput: 1.88 Mbit/s

95th percentile per-packet one-way delay: 11.970 ms

Loss rate: 81.40%

## Run 2: Report of FillP — Data Link



Run 3: Statistics of FillP

Start at: 2018-02-27 09:14:52

End at: 2018-02-27 09:15:22

# Below is generated by plot.py at 2018-02-27 10:40:52

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 1.98 Mbit/s (16.5% utilization)

95th percentile per-packet one-way delay: 12.005 ms

Loss rate: 88.91%

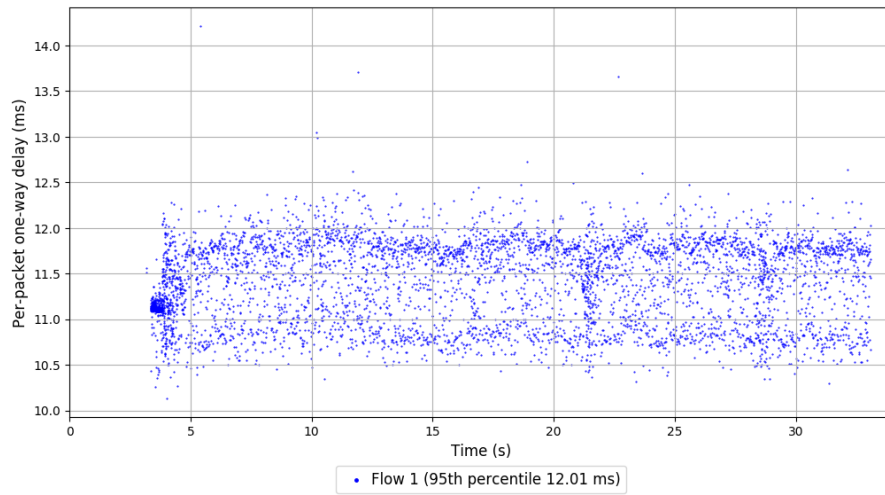
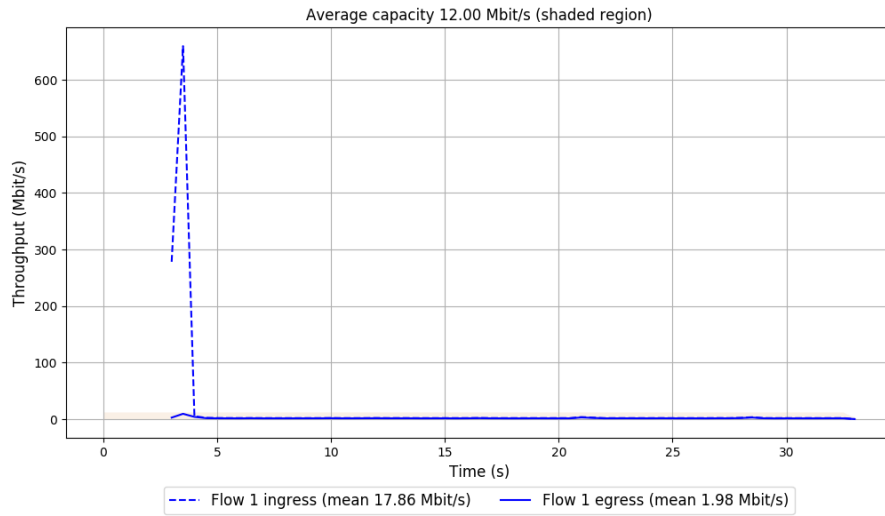
-- Flow 1:

Average throughput: 1.98 Mbit/s

95th percentile per-packet one-way delay: 12.005 ms

Loss rate: 88.91%

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



Run 4: Statistics of FillP

Start at: 2018-02-27 09:25:08

End at: 2018-02-27 09:25:38

# Below is generated by plot.py at 2018-02-27 10:40:52

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 1.80 Mbit/s (15.0% utilization)

95th percentile per-packet one-way delay: 11.908 ms

Loss rate: 72.23%

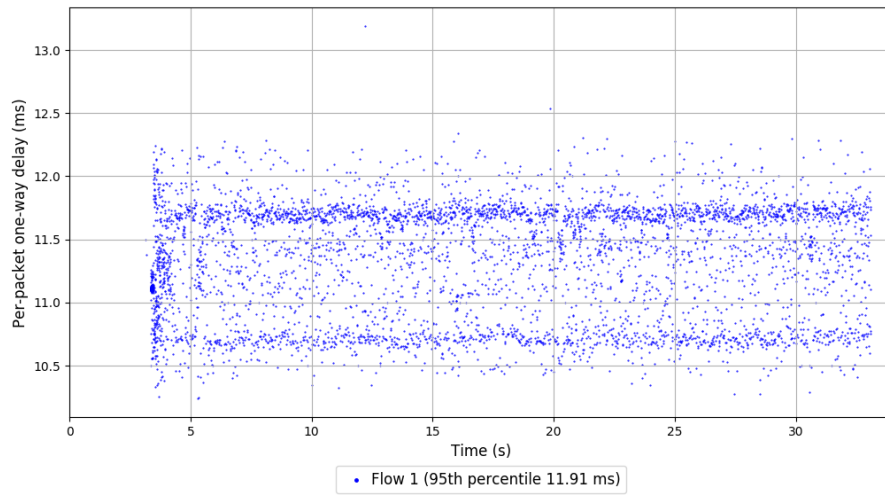
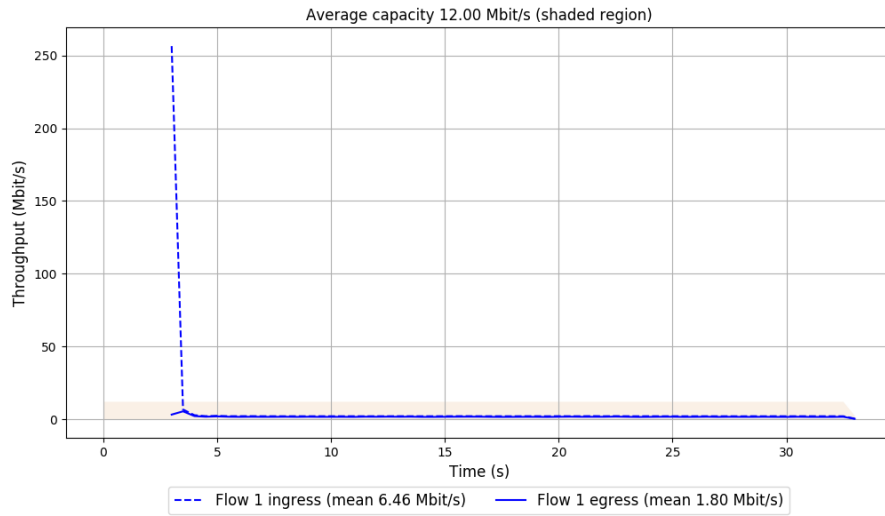
-- Flow 1:

Average throughput: 1.80 Mbit/s

95th percentile per-packet one-way delay: 11.908 ms

Loss rate: 72.23%

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



Run 5: Statistics of FillP

Start at: 2018-02-27 09:35:22

End at: 2018-02-27 09:35:52

# Below is generated by plot.py at 2018-02-27 10:40:52

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 1.80 Mbit/s (15.0% utilization)

95th percentile per-packet one-way delay: 11.947 ms

Loss rate: 71.52%

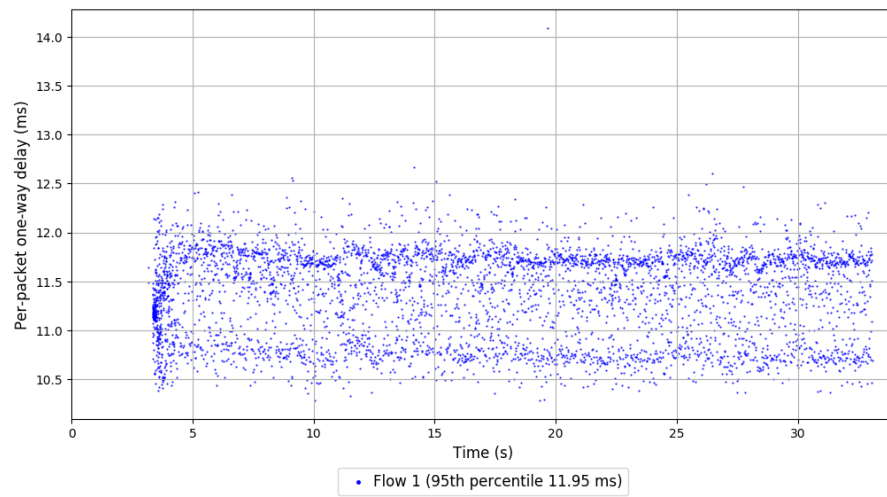
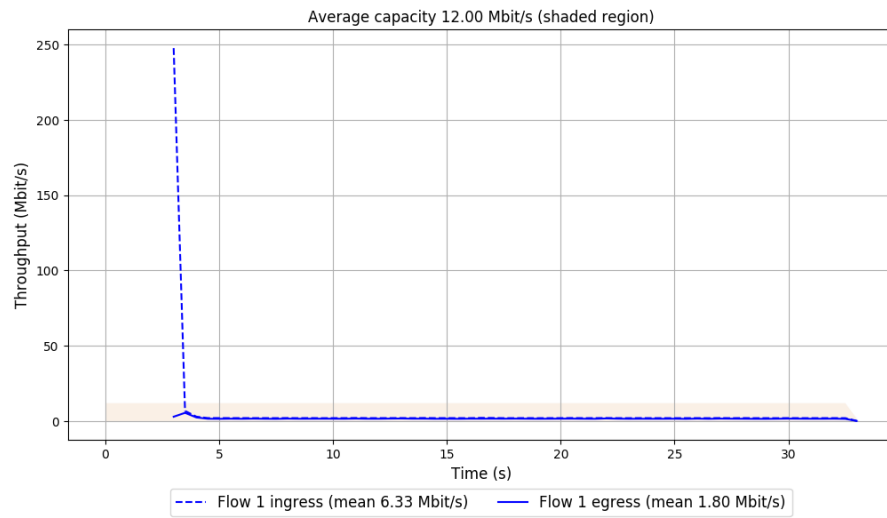
-- Flow 1:

Average throughput: 1.80 Mbit/s

95th percentile per-packet one-way delay: 11.947 ms

Loss rate: 71.52%

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



Run 6: Statistics of FillP

Start at: 2018-02-27 09:45:35

End at: 2018-02-27 09:46:05

# Below is generated by plot.py at 2018-02-27 10:40:52

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 1.77 Mbit/s (14.8% utilization)

95th percentile per-packet one-way delay: 11.944 ms

Loss rate: 63.68%

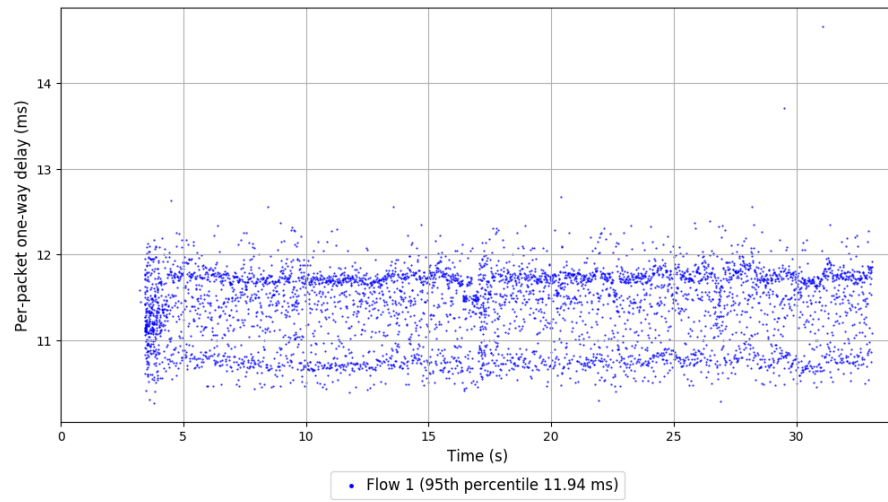
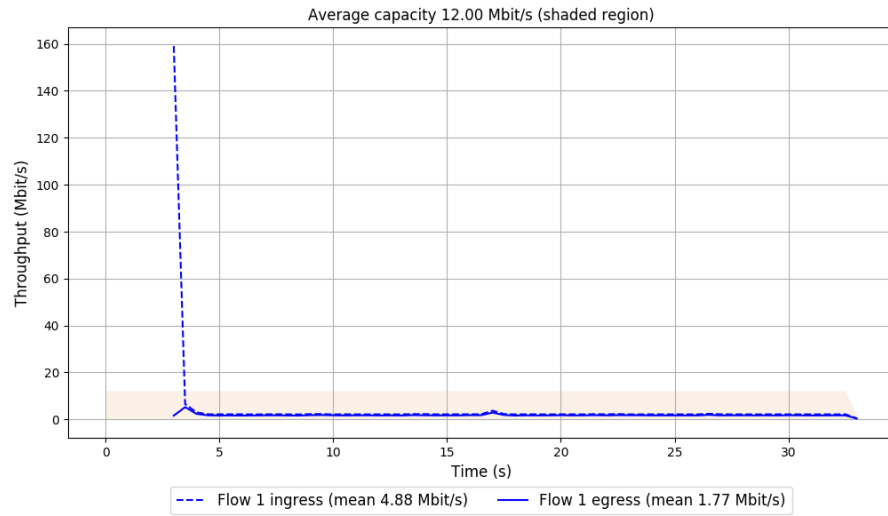
-- Flow 1:

Average throughput: 1.77 Mbit/s

95th percentile per-packet one-way delay: 11.944 ms

Loss rate: 63.68%

## Run 6: Report of FillP — Data Link



Run 7: Statistics of FillP

Start at: 2018-02-27 09:55:46

End at: 2018-02-27 09:56:16

# Below is generated by plot.py at 2018-02-27 10:40:52

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 1.90 Mbit/s (15.9% utilization)

95th percentile per-packet one-way delay: 11.930 ms

Loss rate: 85.14%

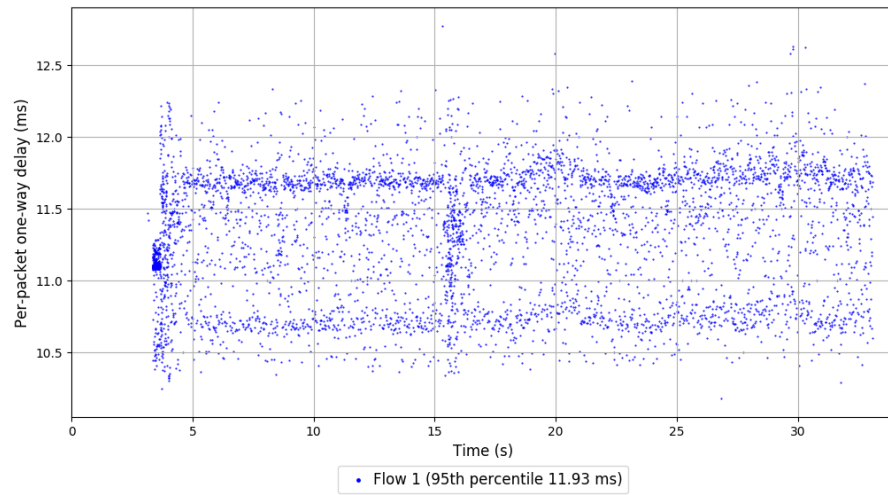
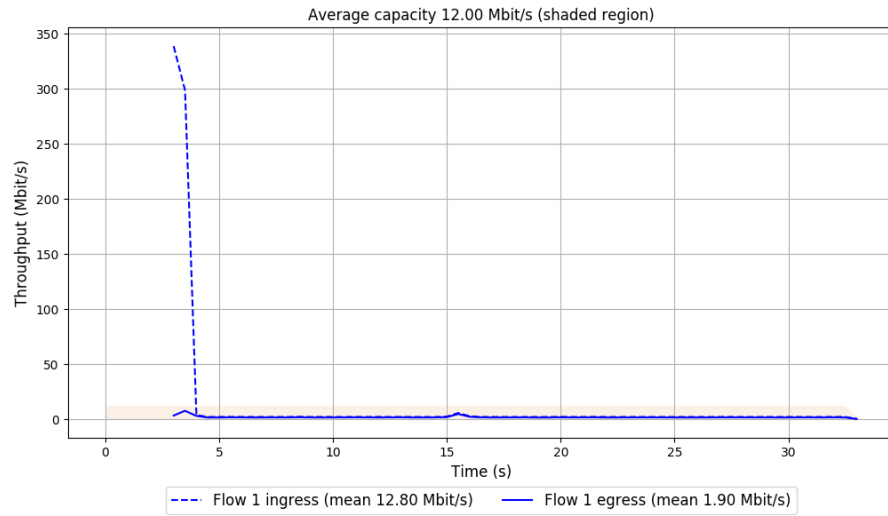
-- Flow 1:

Average throughput: 1.90 Mbit/s

95th percentile per-packet one-way delay: 11.930 ms

Loss rate: 85.14%

## Run 7: Report of FillP — Data Link



Run 8: Statistics of FillP

Start at: 2018-02-27 10:05:56

End at: 2018-02-27 10:06:26

# Below is generated by plot.py at 2018-02-27 10:40:52

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 1.83 Mbit/s (15.3% utilization)

95th percentile per-packet one-way delay: 11.995 ms

Loss rate: 78.23%

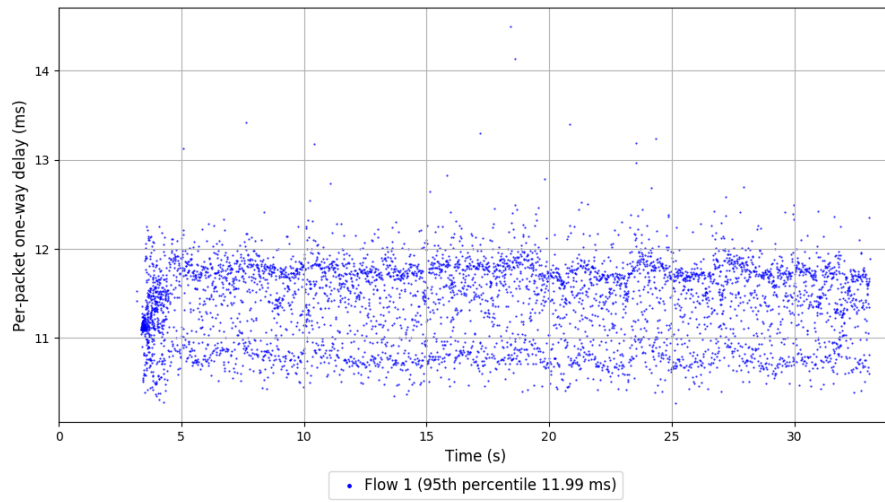
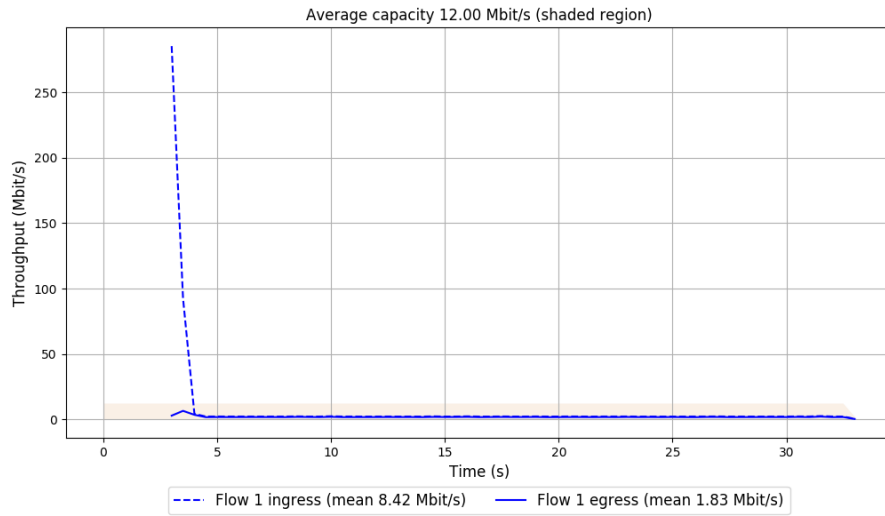
-- Flow 1:

Average throughput: 1.83 Mbit/s

95th percentile per-packet one-way delay: 11.995 ms

Loss rate: 78.23%

### Run 8: Report of FillP — Data Link



Run 9: Statistics of FillP

Start at: 2018-02-27 10:16:12

End at: 2018-02-27 10:16:42

# Below is generated by plot.py at 2018-02-27 10:40:52

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 1.77 Mbit/s (14.8% utilization)

95th percentile per-packet one-way delay: 11.980 ms

Loss rate: 56.56%

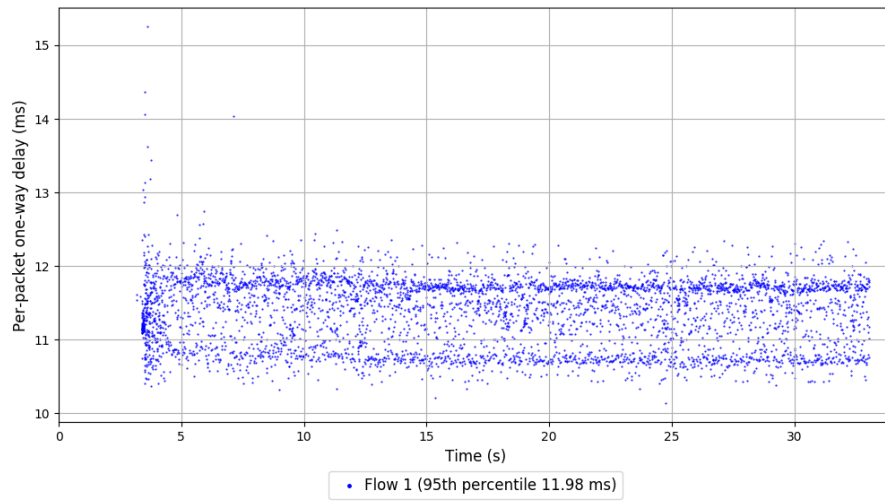
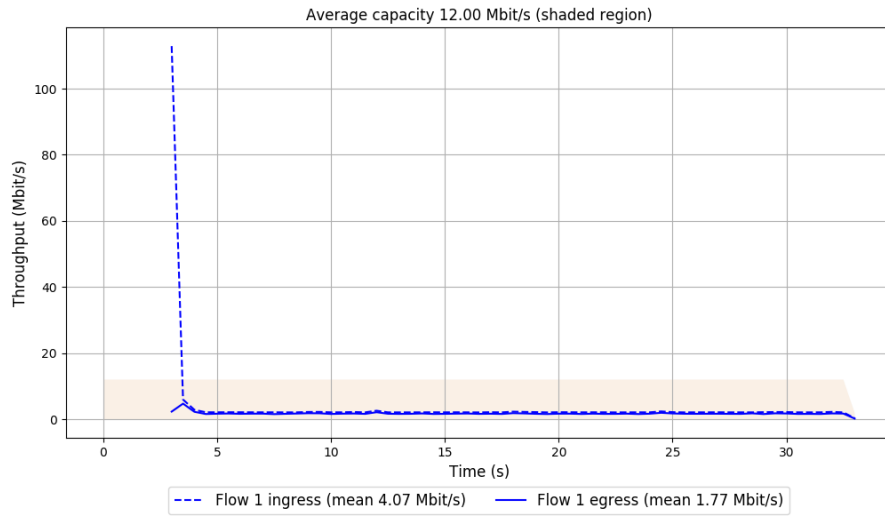
-- Flow 1:

Average throughput: 1.77 Mbit/s

95th percentile per-packet one-way delay: 11.980 ms

Loss rate: 56.56%

### Run 9: Report of FillP — Data Link



Run 10: Statistics of FillP

Start at: 2018-02-27 10:26:23

End at: 2018-02-27 10:26:53

# Below is generated by plot.py at 2018-02-27 10:40:52

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 1.93 Mbit/s (16.1% utilization)

95th percentile per-packet one-way delay: 11.918 ms

Loss rate: 88.41%

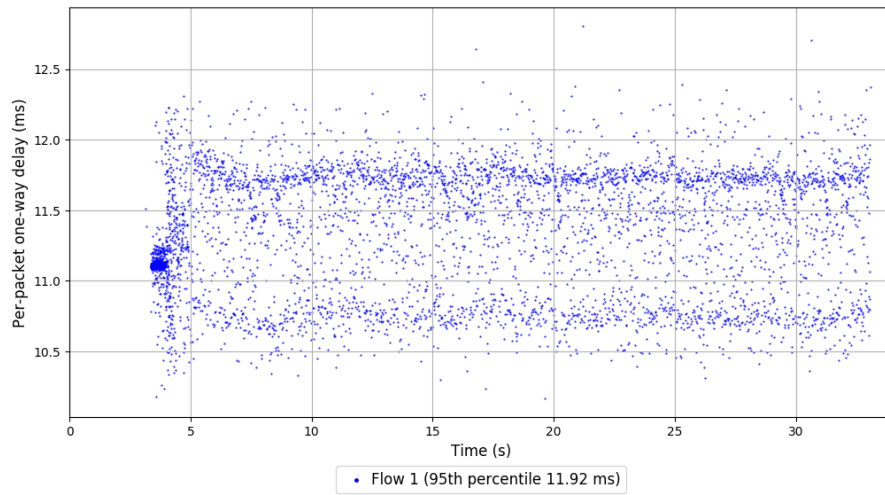
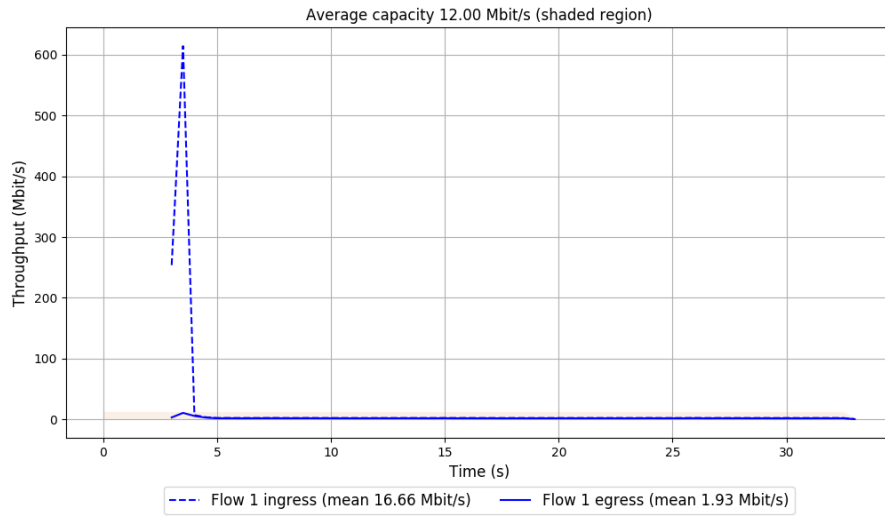
-- Flow 1:

Average throughput: 1.93 Mbit/s

95th percentile per-packet one-way delay: 11.918 ms

Loss rate: 88.41%

# Run 10: Report of FillP — Data Link



Run 1: Statistics of Indigo-1-32

Start at: 2018-02-27 08:55:05

End at: 2018-02-27 08:55:35

# Below is generated by plot.py at 2018-02-27 10:40:52

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 1.16 Mbit/s (9.7% utilization)

95th percentile per-packet one-way delay: 12.183 ms

Loss rate: 95.56%

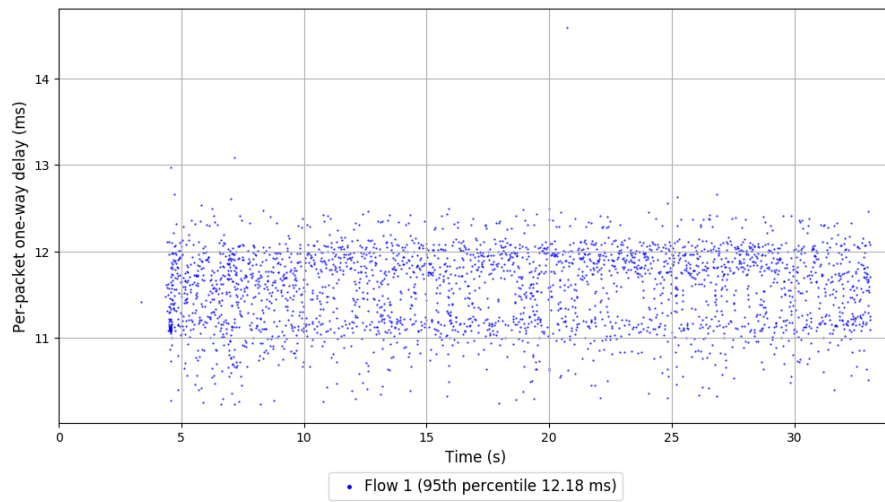
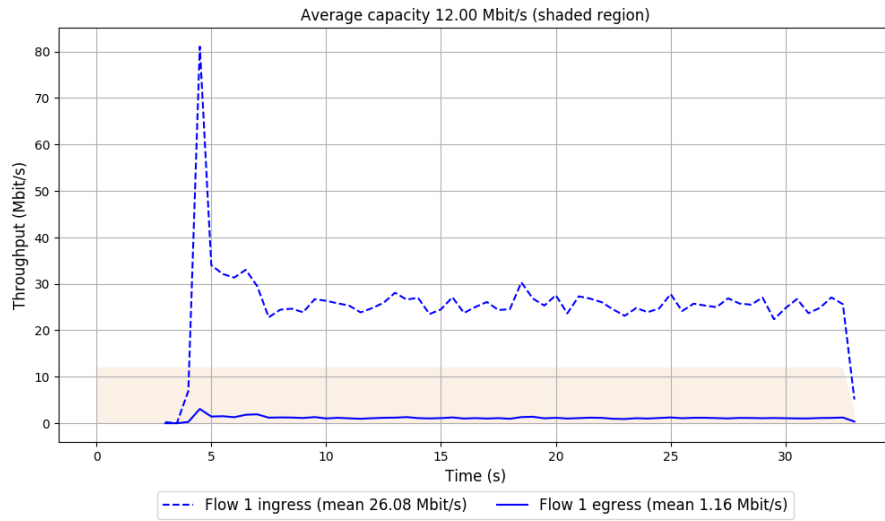
-- Flow 1:

Average throughput: 1.16 Mbit/s

95th percentile per-packet one-way delay: 12.183 ms

Loss rate: 95.56%

# Run 1: Report of Indigo-1-32 — Data Link



Run 2: Statistics of Indigo-1-32

Start at: 2018-02-27 09:05:15

End at: 2018-02-27 09:05:45

# Below is generated by plot.py at 2018-02-27 10:40:52

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 1.14 Mbit/s (9.5% utilization)

95th percentile per-packet one-way delay: 12.285 ms

Loss rate: 95.19%

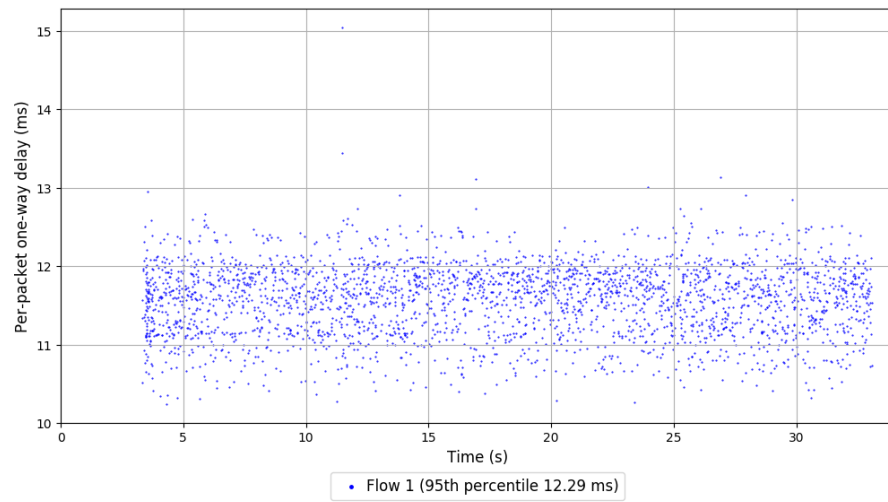
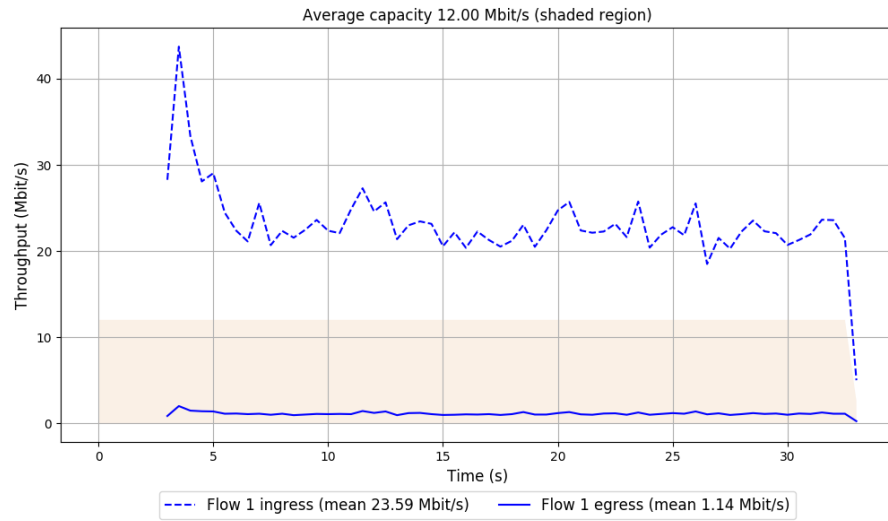
-- Flow 1:

Average throughput: 1.14 Mbit/s

95th percentile per-packet one-way delay: 12.285 ms

Loss rate: 95.19%

## Run 2: Report of Indigo-1-32 — Data Link



Run 3: Statistics of Indigo-1-32

Start at: 2018-02-27 09:15:26

End at: 2018-02-27 09:15:56

# Below is generated by plot.py at 2018-02-27 10:40:52

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 1.23 Mbit/s (10.3% utilization)

95th percentile per-packet one-way delay: 12.394 ms

Loss rate: 95.28%

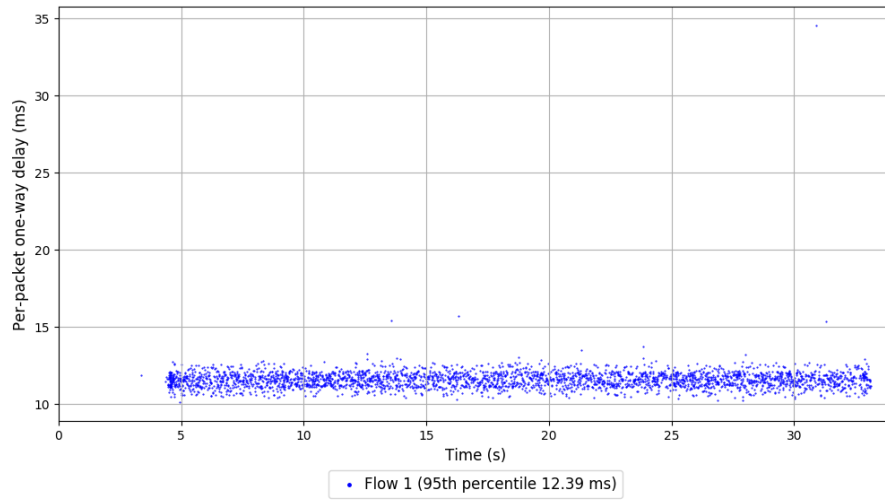
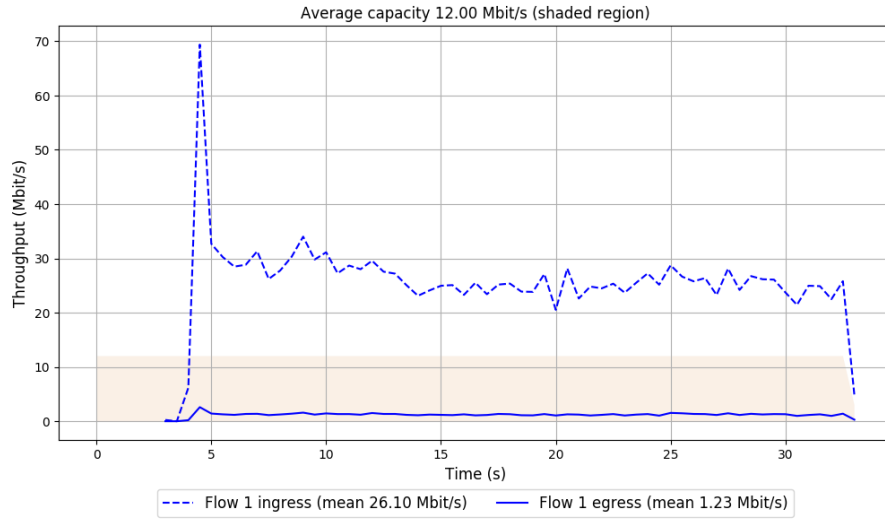
-- Flow 1:

Average throughput: 1.23 Mbit/s

95th percentile per-packet one-way delay: 12.394 ms

Loss rate: 95.28%

### Run 3: Report of Indigo-1-32 — Data Link



Run 4: Statistics of Indigo-1-32

Start at: 2018-02-27 09:25:42

End at: 2018-02-27 09:26:12

# Below is generated by plot.py at 2018-02-27 10:40:52

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 1.20 Mbit/s (10.0% utilization)

95th percentile per-packet one-way delay: 12.136 ms

Loss rate: 95.43%

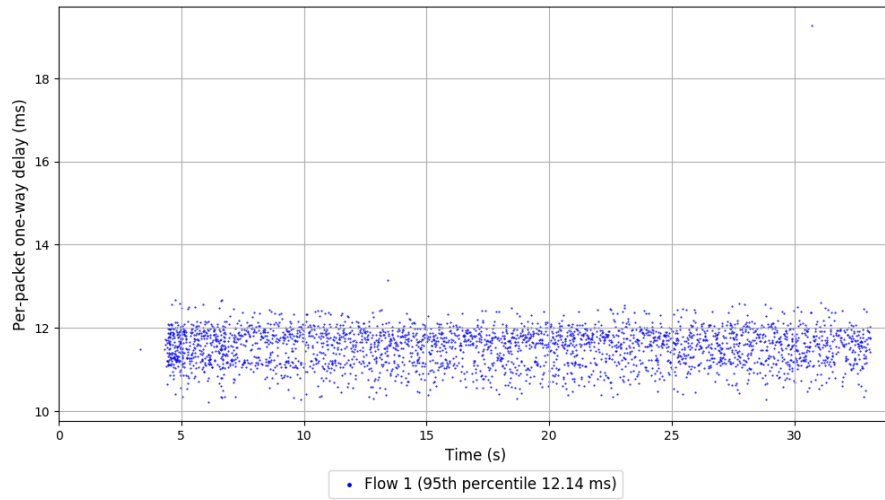
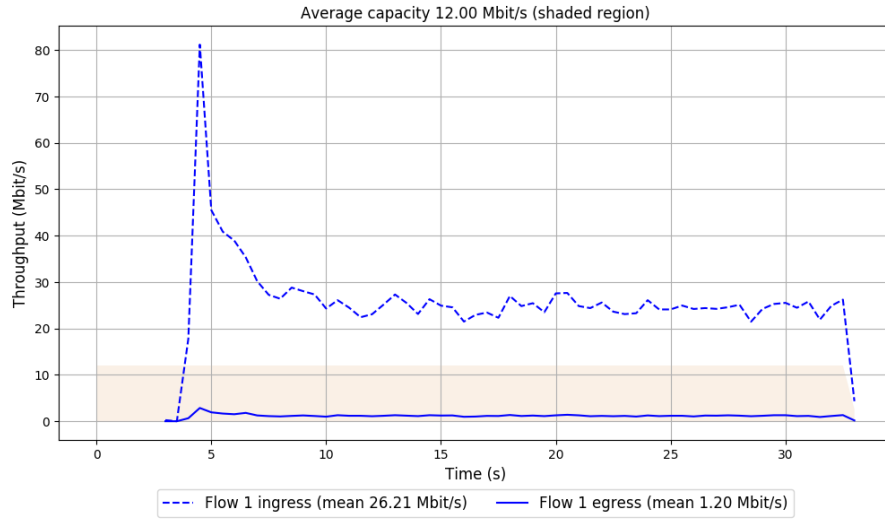
-- Flow 1:

Average throughput: 1.20 Mbit/s

95th percentile per-packet one-way delay: 12.136 ms

Loss rate: 95.43%

### Run 4: Report of Indigo-1-32 — Data Link



Run 5: Statistics of Indigo-1-32

Start at: 2018-02-27 09:35:56

End at: 2018-02-27 09:36:26

# Below is generated by plot.py at 2018-02-27 10:40:52

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 1.04 Mbit/s (8.7% utilization)

95th percentile per-packet one-way delay: 12.229 ms

Loss rate: 95.07%

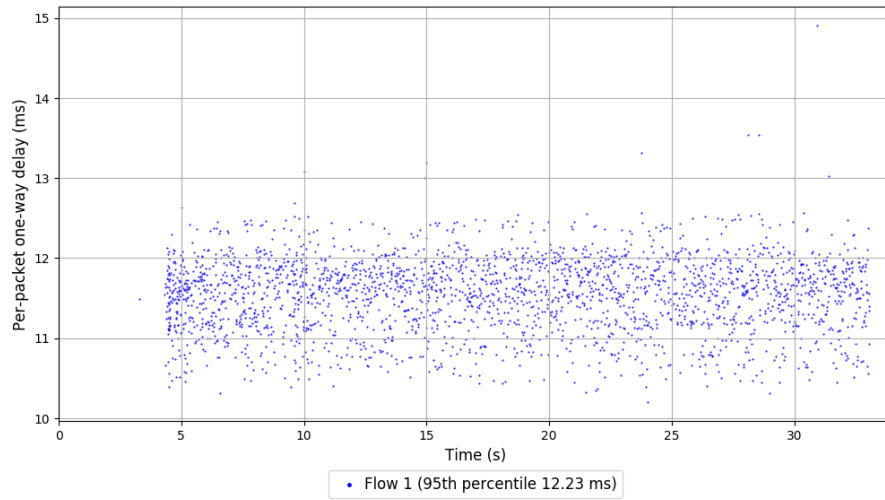
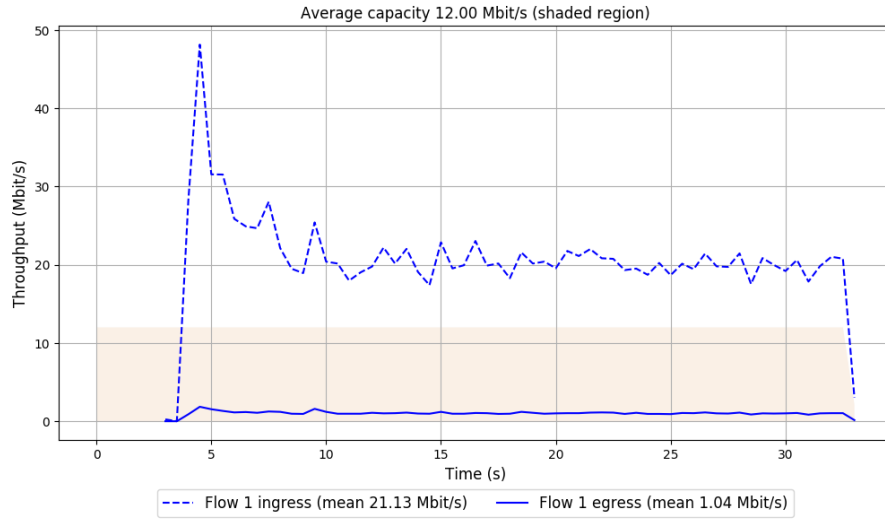
-- Flow 1:

Average throughput: 1.04 Mbit/s

95th percentile per-packet one-way delay: 12.229 ms

Loss rate: 95.07%

### Run 5: Report of Indigo-1-32 — Data Link



Run 6: Statistics of Indigo-1-32

Start at: 2018-02-27 09:46:08

End at: 2018-02-27 09:46:38

# Below is generated by plot.py at 2018-02-27 10:40:53

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 1.20 Mbit/s (10.0% utilization)

95th percentile per-packet one-way delay: 12.120 ms

Loss rate: 94.99%

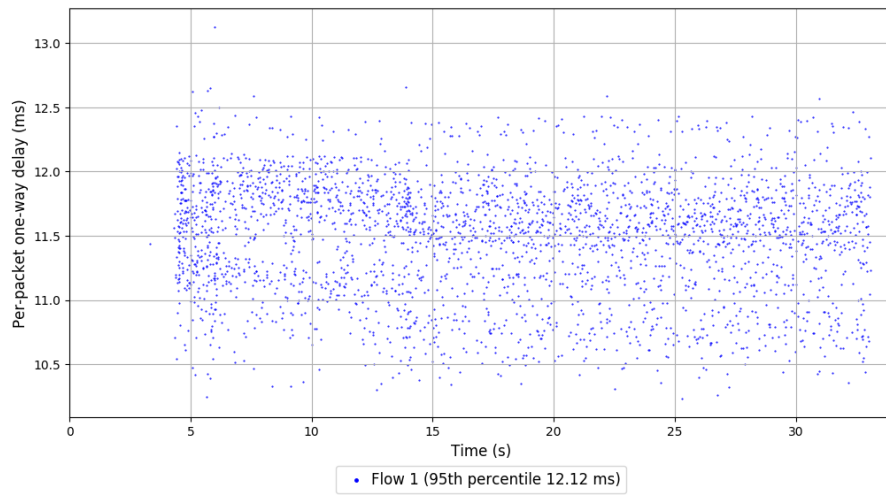
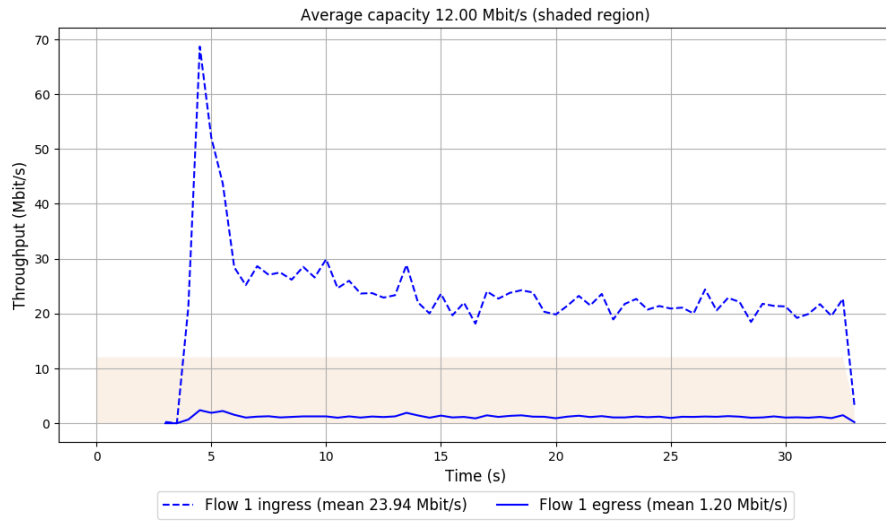
-- Flow 1:

Average throughput: 1.20 Mbit/s

95th percentile per-packet one-way delay: 12.120 ms

Loss rate: 94.99%

## Run 6: Report of Indigo-1-32 — Data Link



Run 7: Statistics of Indigo-1-32

Start at: 2018-02-27 09:56:20

End at: 2018-02-27 09:56:50

# Below is generated by plot.py at 2018-02-27 10:40:53

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 1.12 Mbit/s (9.3% utilization)

95th percentile per-packet one-way delay: 12.320 ms

Loss rate: 95.48%

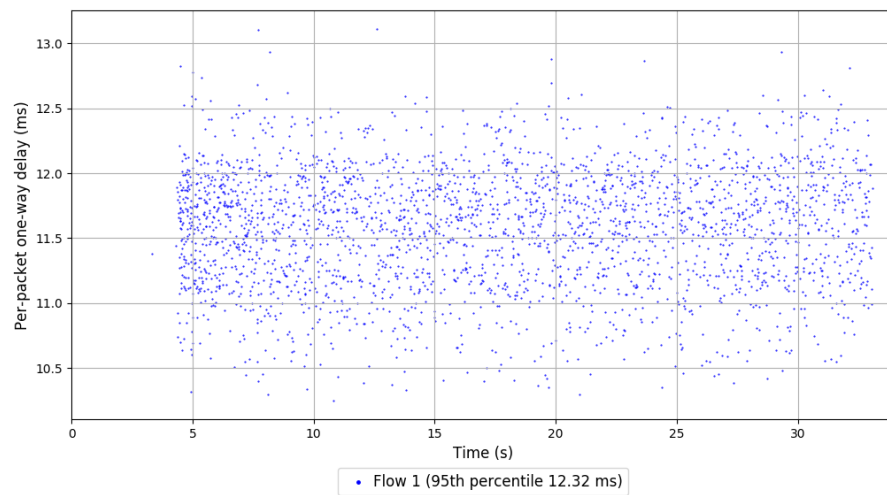
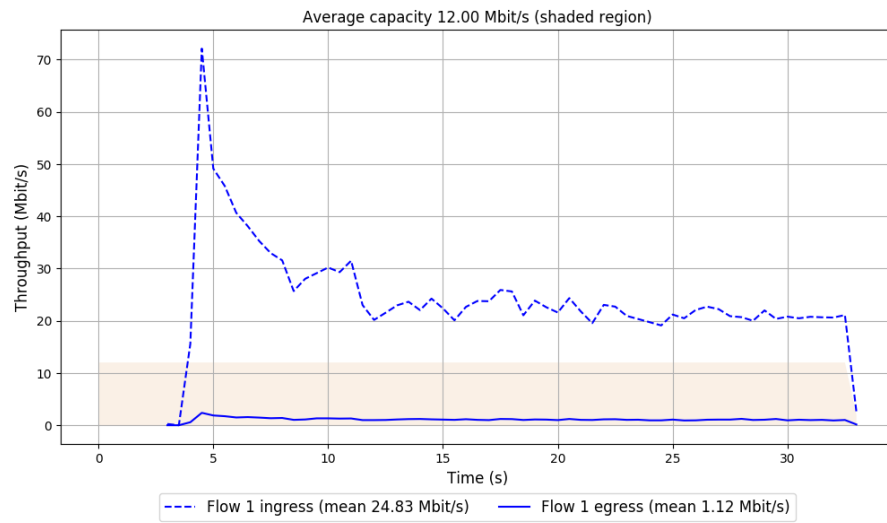
-- Flow 1:

Average throughput: 1.12 Mbit/s

95th percentile per-packet one-way delay: 12.320 ms

Loss rate: 95.48%

### Run 7: Report of Indigo-1-32 — Data Link



Run 8: Statistics of Indigo-1-32

Start at: 2018-02-27 10:06:30

End at: 2018-02-27 10:07:00

# Below is generated by plot.py at 2018-02-27 10:40:53

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 1.14 Mbit/s (9.5% utilization)

95th percentile per-packet one-way delay: 12.304 ms

Loss rate: 95.20%

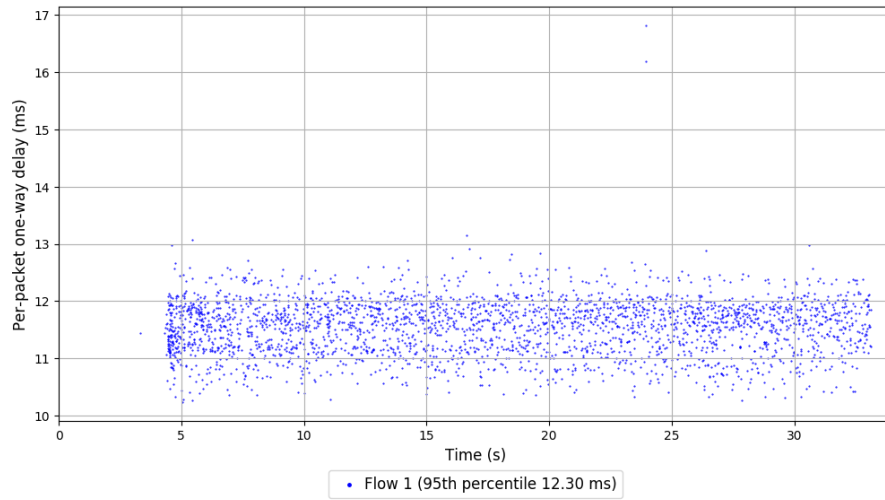
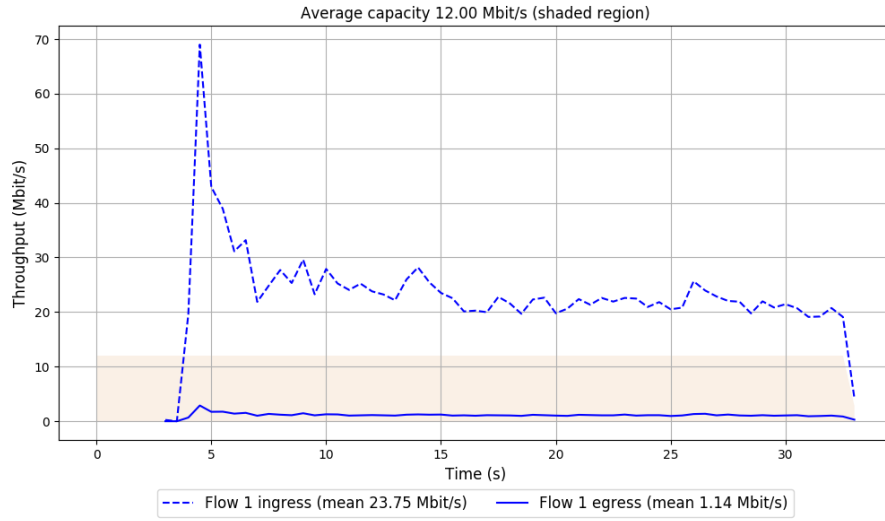
-- Flow 1:

Average throughput: 1.14 Mbit/s

95th percentile per-packet one-way delay: 12.304 ms

Loss rate: 95.20%

### Run 8: Report of Indigo-1-32 — Data Link



Run 9: Statistics of Indigo-1-32

Start at: 2018-02-27 10:16:46

End at: 2018-02-27 10:17:16

# Below is generated by plot.py at 2018-02-27 10:40:53

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 1.24 Mbit/s (10.3% utilization)

95th percentile per-packet one-way delay: 12.312 ms

Loss rate: 95.38%

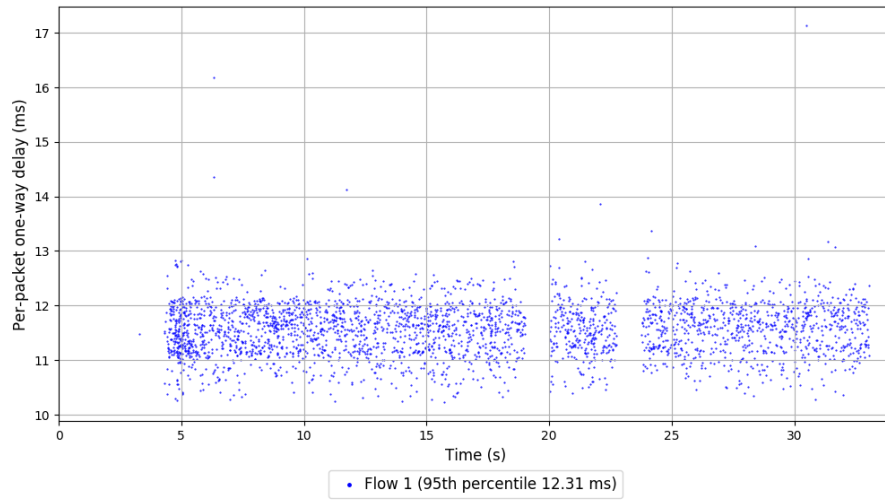
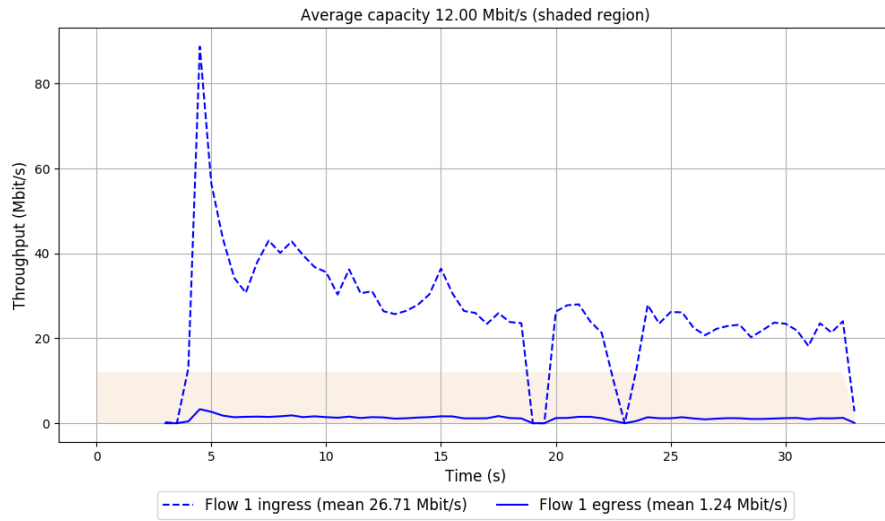
-- Flow 1:

Average throughput: 1.24 Mbit/s

95th percentile per-packet one-way delay: 12.312 ms

Loss rate: 95.38%

### Run 9: Report of Indigo-1-32 — Data Link



Run 10: Statistics of Indigo-1-32

Start at: 2018-02-27 10:26:57

End at: 2018-02-27 10:27:27

# Below is generated by plot.py at 2018-02-27 10:40:53

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 1.15 Mbit/s (9.6% utilization)

95th percentile per-packet one-way delay: 12.329 ms

Loss rate: 95.24%

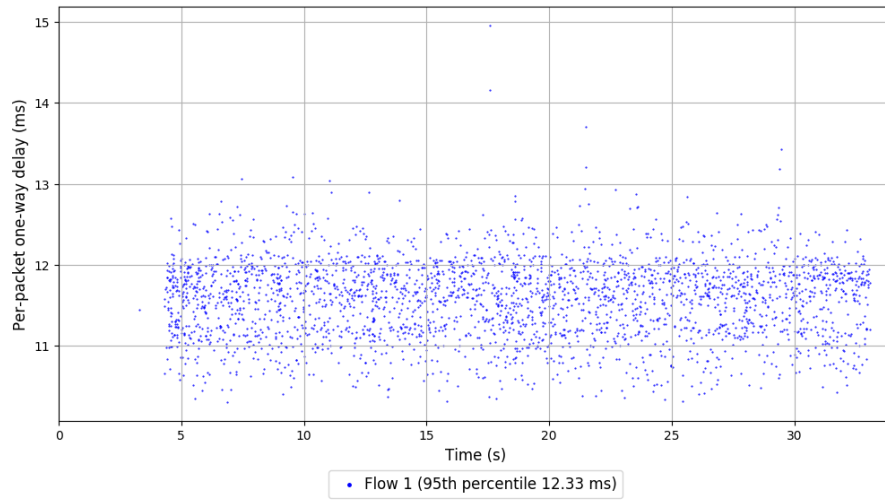
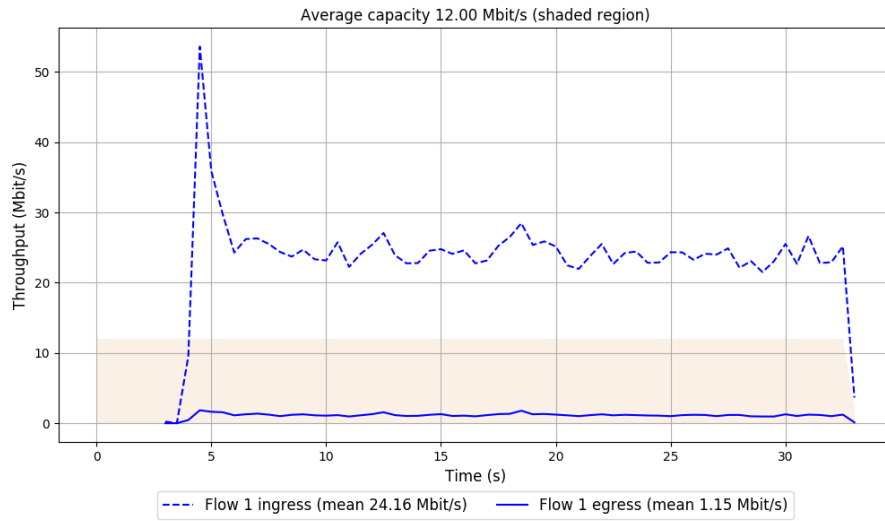
-- Flow 1:

Average throughput: 1.15 Mbit/s

95th percentile per-packet one-way delay: 12.329 ms

Loss rate: 95.24%

# Run 10: Report of Indigo-1-32 — Data Link



Run 1: Statistics of Vivace-latency

Start at: 2018-02-27 08:59:03

End at: 2018-02-27 08:59:33

# Below is generated by plot.py at 2018-02-27 10:40:53

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 6.96 Mbit/s (58.0% utilization)

95th percentile per-packet one-way delay: 11.976 ms

Loss rate: 0.92%

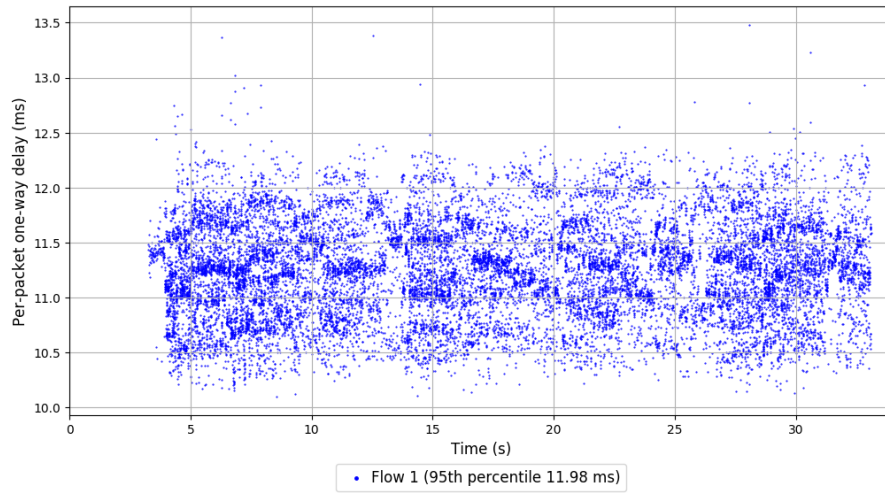
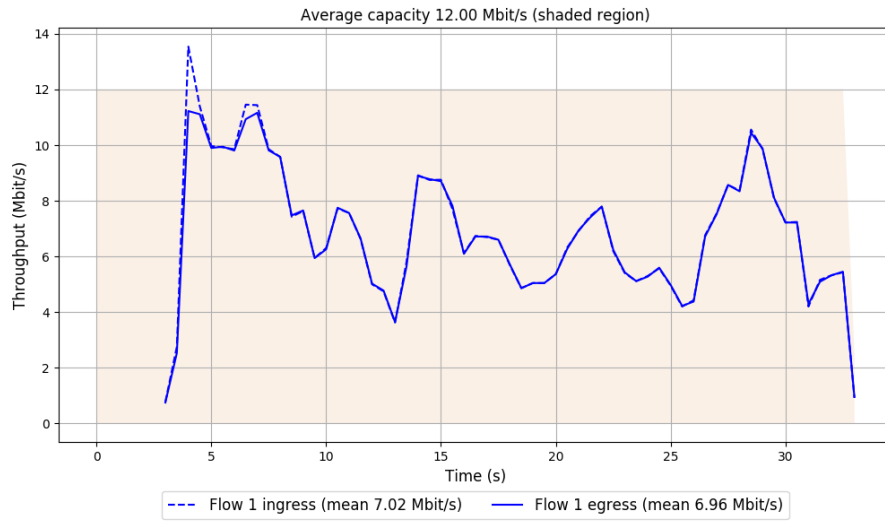
-- Flow 1:

Average throughput: 6.96 Mbit/s

95th percentile per-packet one-way delay: 11.976 ms

Loss rate: 0.92%

### Run 1: Report of Vivace-latency — Data Link



Run 2: Statistics of Vivace-latency

Start at: 2018-02-27 09:09:13

End at: 2018-02-27 09:09:43

# Below is generated by plot.py at 2018-02-27 10:40:53

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 7.15 Mbit/s (59.5% utilization)

95th percentile per-packet one-way delay: 11.961 ms

Loss rate: 0.91%

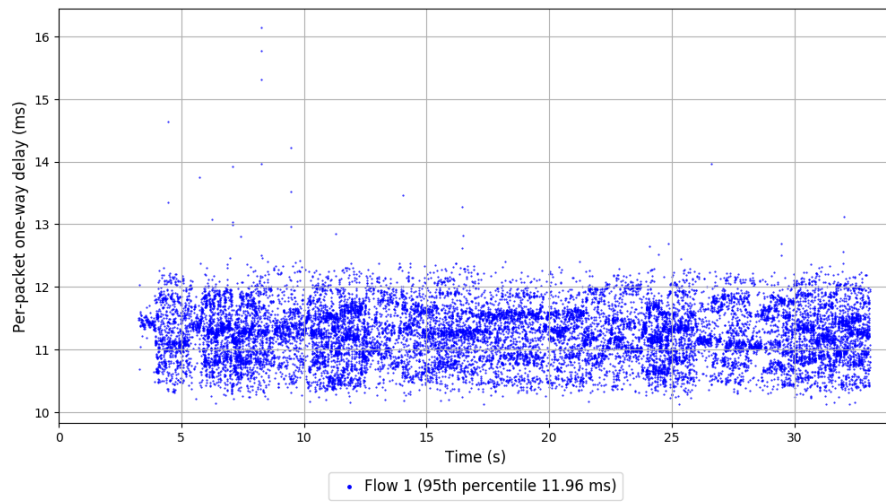
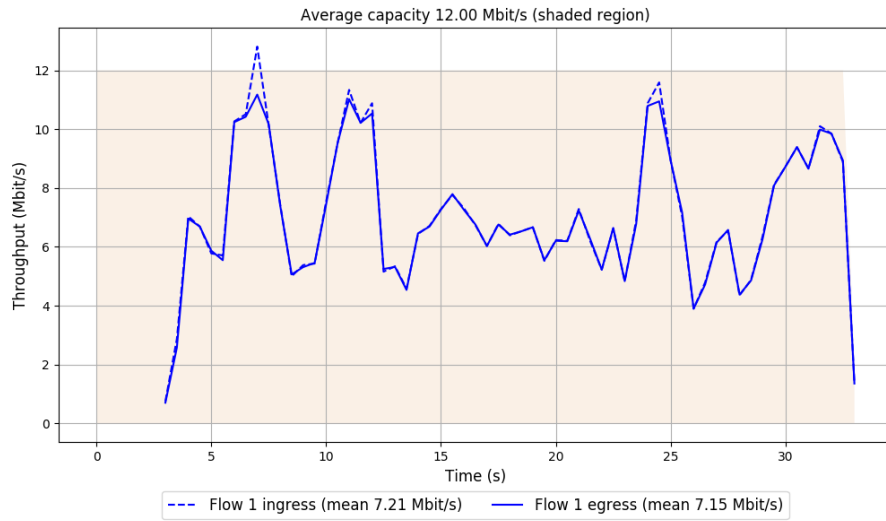
-- Flow 1:

Average throughput: 7.15 Mbit/s

95th percentile per-packet one-way delay: 11.961 ms

Loss rate: 0.91%

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



Run 3: Statistics of Vivace-latency

Start at: 2018-02-27 09:19:25

End at: 2018-02-27 09:19:55

# Below is generated by plot.py at 2018-02-27 10:40:53

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 6.45 Mbit/s (53.7% utilization)

95th percentile per-packet one-way delay: 12.033 ms

Loss rate: 0.56%

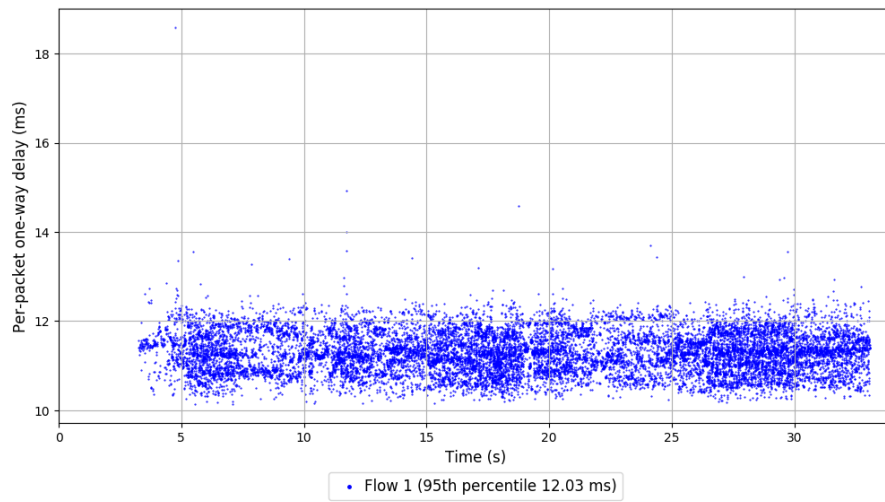
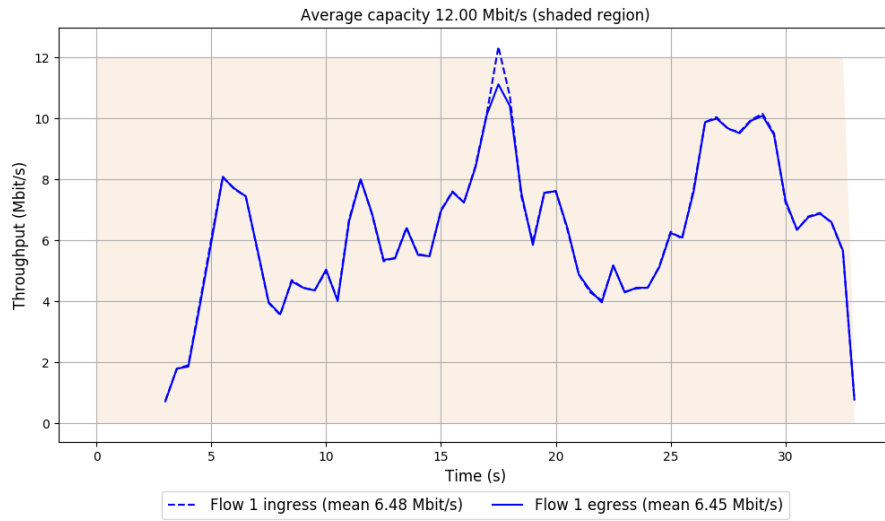
-- Flow 1:

Average throughput: 6.45 Mbit/s

95th percentile per-packet one-way delay: 12.033 ms

Loss rate: 0.56%

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



Run 4: Statistics of Vivace-latency

Start at: 2018-02-27 09:29:40

End at: 2018-02-27 09:30:10

# Below is generated by plot.py at 2018-02-27 10:40:53

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 7.00 Mbit/s (58.3% utilization)

95th percentile per-packet one-way delay: 11.929 ms

Loss rate: 1.22%

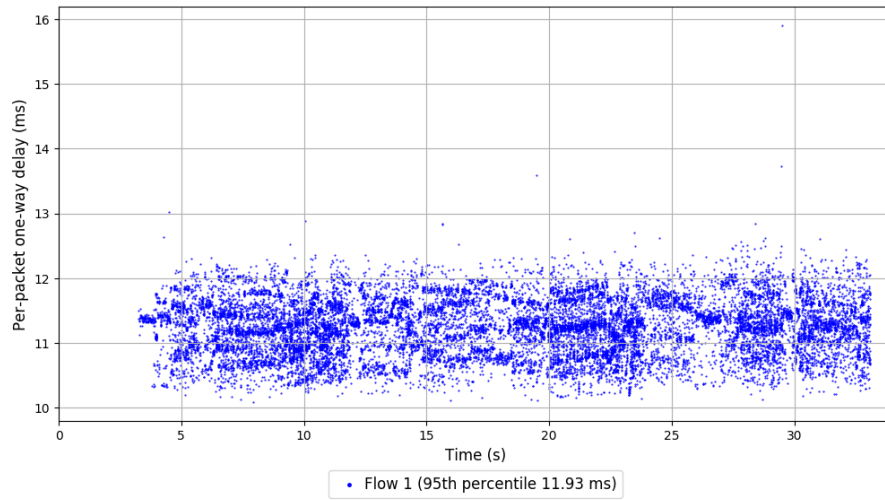
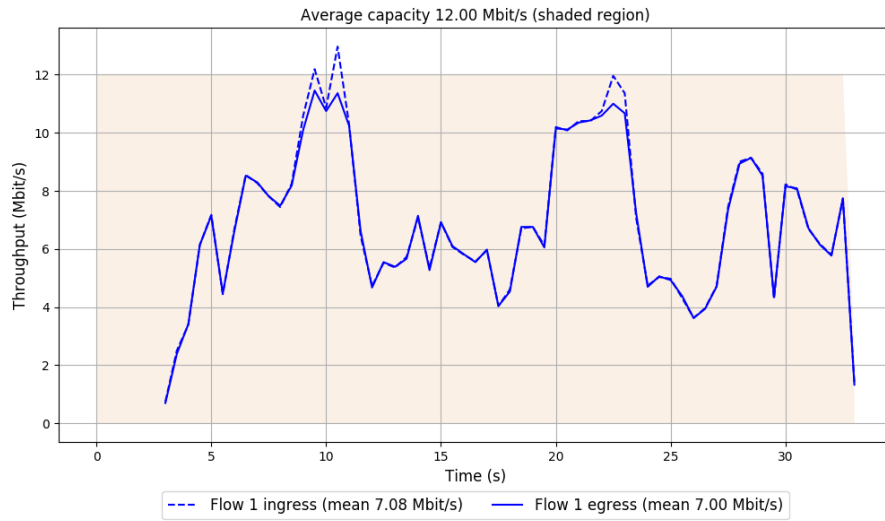
-- Flow 1:

Average throughput: 7.00 Mbit/s

95th percentile per-packet one-way delay: 11.929 ms

Loss rate: 1.22%

### Run 4: Report of Vivace-latency — Data Link



Run 5: Statistics of Vivace-latency

Start at: 2018-02-27 09:39:54

End at: 2018-02-27 09:40:24

# Below is generated by plot.py at 2018-02-27 10:40:53

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 6.39 Mbit/s (53.3% utilization)

95th percentile per-packet one-way delay: 11.954 ms

Loss rate: 0.23%

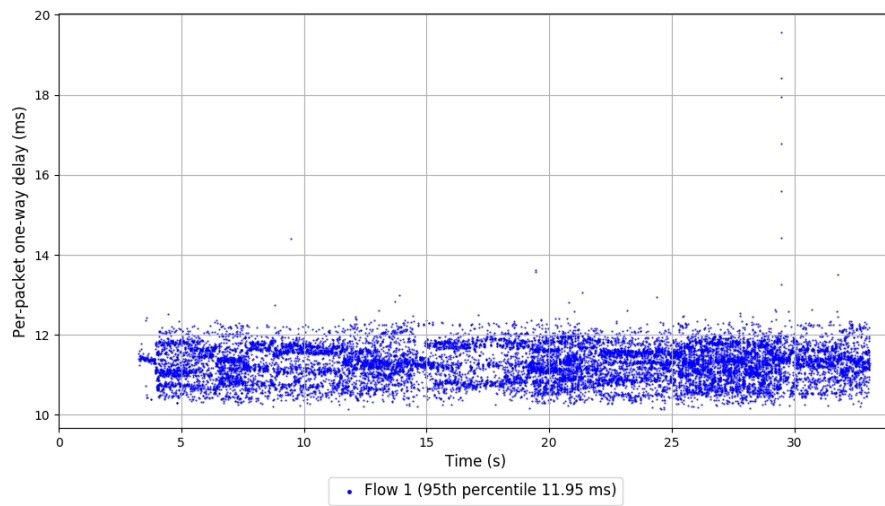
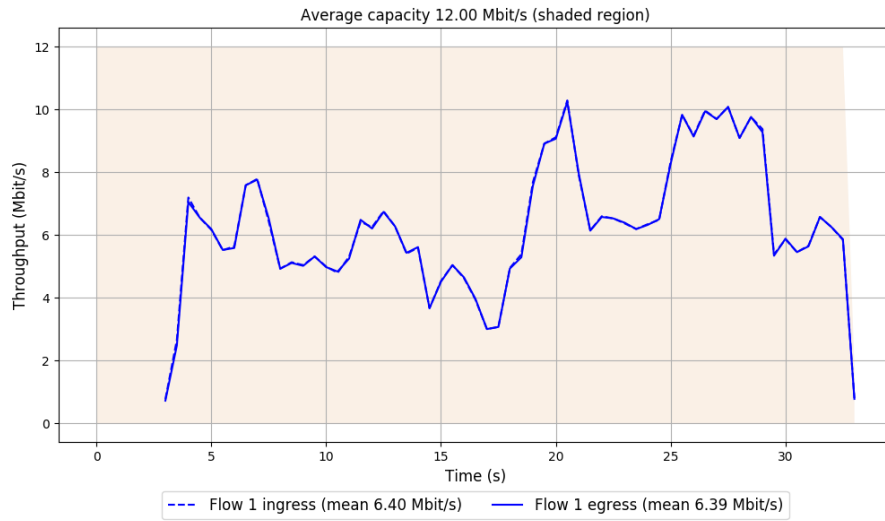
-- Flow 1:

Average throughput: 6.39 Mbit/s

95th percentile per-packet one-way delay: 11.954 ms

Loss rate: 0.23%

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



Run 6: Statistics of Vivace-latency

Start at: 2018-02-27 09:50:07

End at: 2018-02-27 09:50:37

# Below is generated by plot.py at 2018-02-27 10:40:53

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 6.16 Mbit/s (51.4% utilization)

95th percentile per-packet one-way delay: 12.044 ms

Loss rate: 0.74%

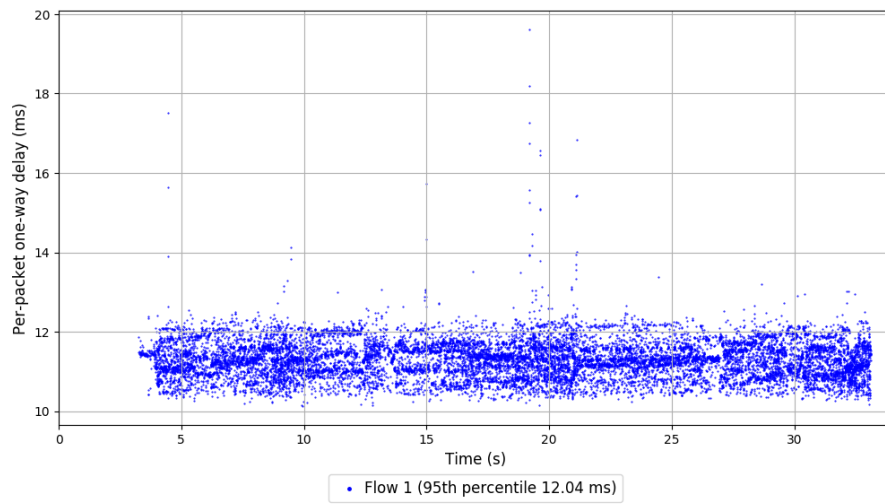
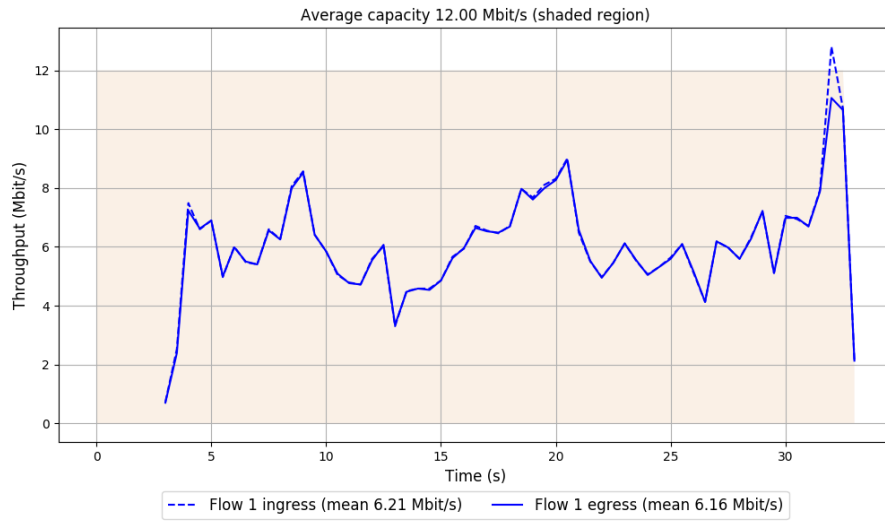
-- Flow 1:

Average throughput: 6.16 Mbit/s

95th percentile per-packet one-way delay: 12.044 ms

Loss rate: 0.74%

### Run 6: Report of Vivace-latency — Data Link



Run 7: Statistics of Vivace-latency

Start at: 2018-02-27 10:00:18

End at: 2018-02-27 10:00:48

# Below is generated by plot.py at 2018-02-27 10:40:53

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 6.18 Mbit/s (51.5% utilization)

95th percentile per-packet one-way delay: 12.006 ms

Loss rate: 0.56%

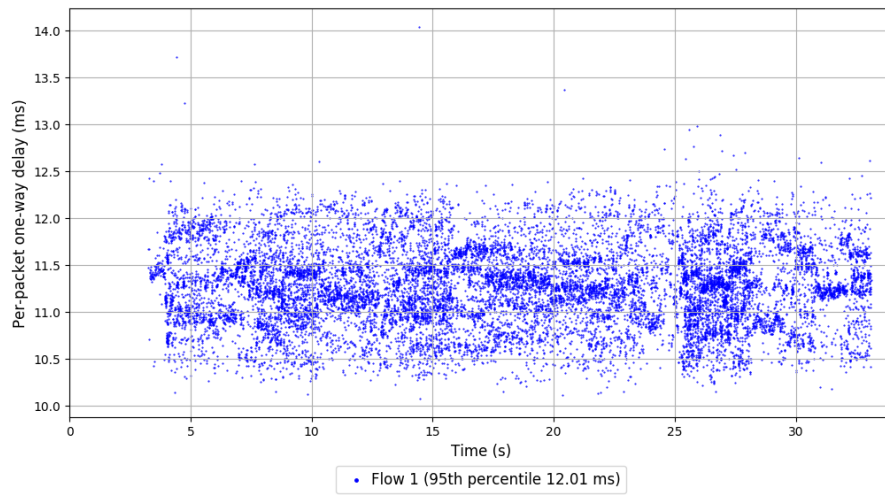
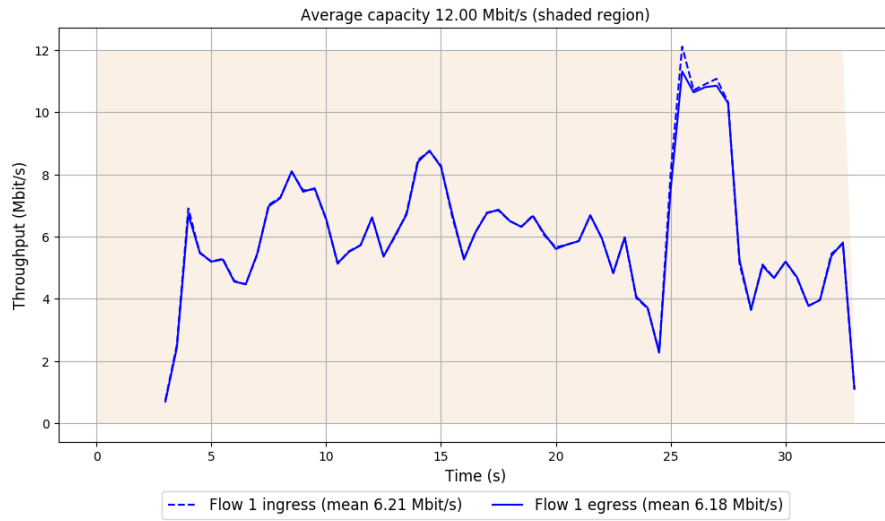
-- Flow 1:

Average throughput: 6.18 Mbit/s

95th percentile per-packet one-way delay: 12.006 ms

Loss rate: 0.56%

### Run 7: Report of Vivace-latency — Data Link



Run 8: Statistics of Vivace-latency

Start at: 2018-02-27 10:10:29

End at: 2018-02-27 10:10:59

# Below is generated by plot.py at 2018-02-27 10:40:53

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 6.81 Mbit/s (56.7% utilization)

95th percentile per-packet one-way delay: 11.925 ms

Loss rate: 1.30%

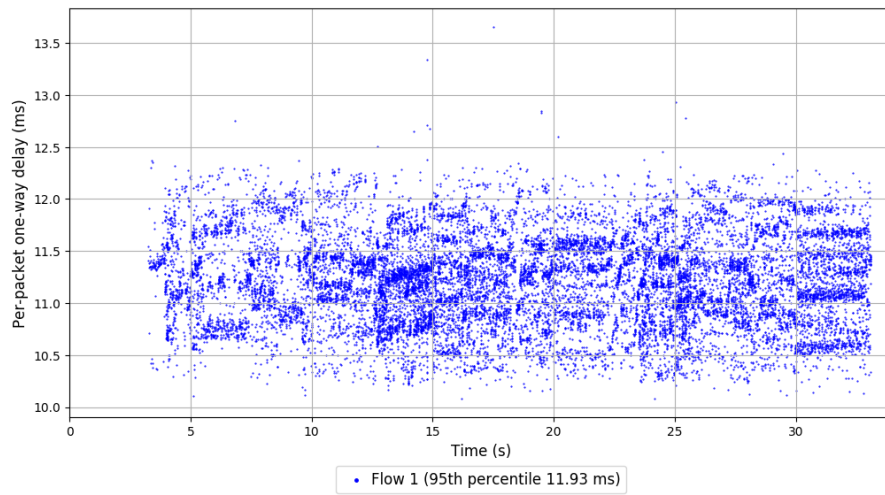
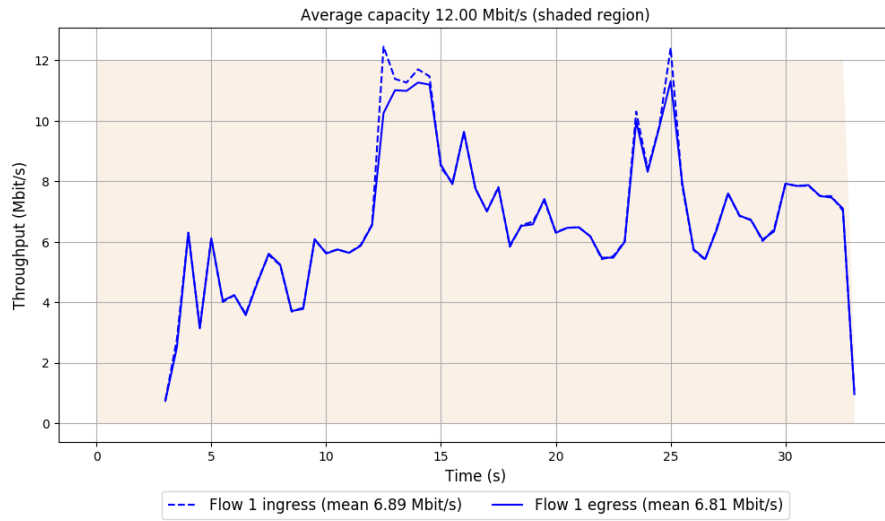
-- Flow 1:

Average throughput: 6.81 Mbit/s

95th percentile per-packet one-way delay: 11.925 ms

Loss rate: 1.30%

### Run 8: Report of Vivace-latency — Data Link



Run 9: Statistics of Vivace-latency

Start at: 2018-02-27 10:20:43

End at: 2018-02-27 10:21:13

# Below is generated by plot.py at 2018-02-27 10:40:53

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 6.72 Mbit/s (56.0% utilization)

95th percentile per-packet one-way delay: 12.008 ms

Loss rate: 0.29%

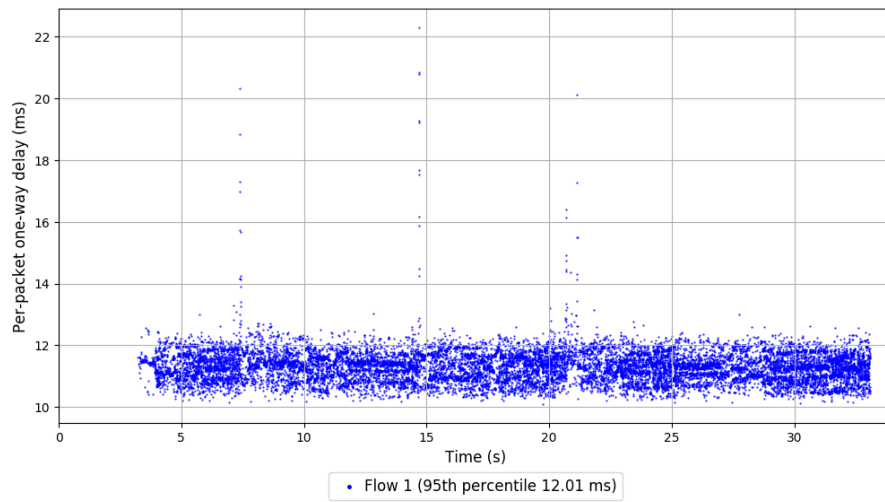
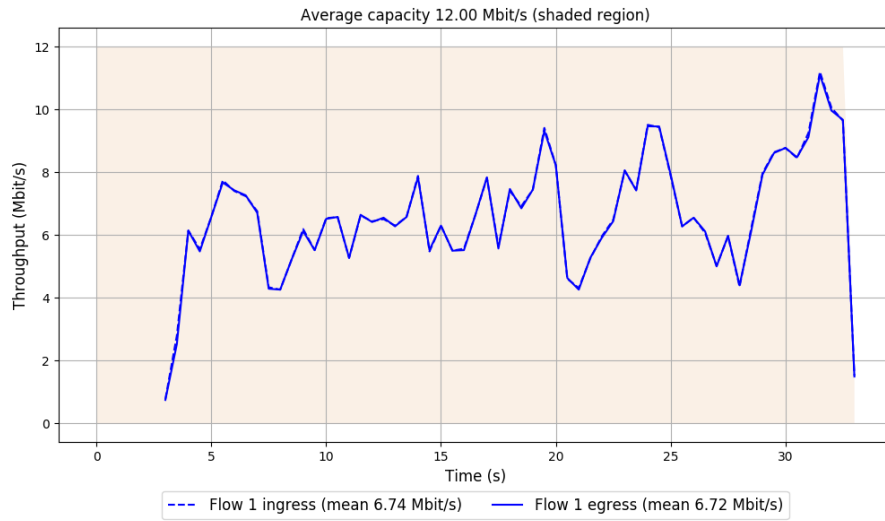
-- Flow 1:

Average throughput: 6.72 Mbit/s

95th percentile per-packet one-way delay: 12.008 ms

Loss rate: 0.29%

### Run 9: Report of Vivace-latency — Data Link



Run 10: Statistics of Vivace-latency

Start at: 2018-02-27 10:30:55

End at: 2018-02-27 10:31:25

# Below is generated by plot.py at 2018-02-27 10:40:53

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 8.47 Mbit/s (70.6% utilization)

95th percentile per-packet one-way delay: 11.942 ms

Loss rate: 1.51%

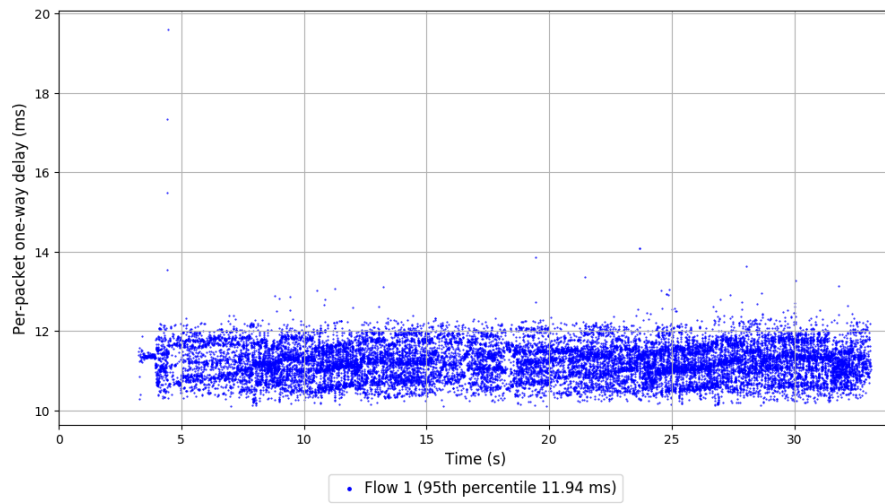
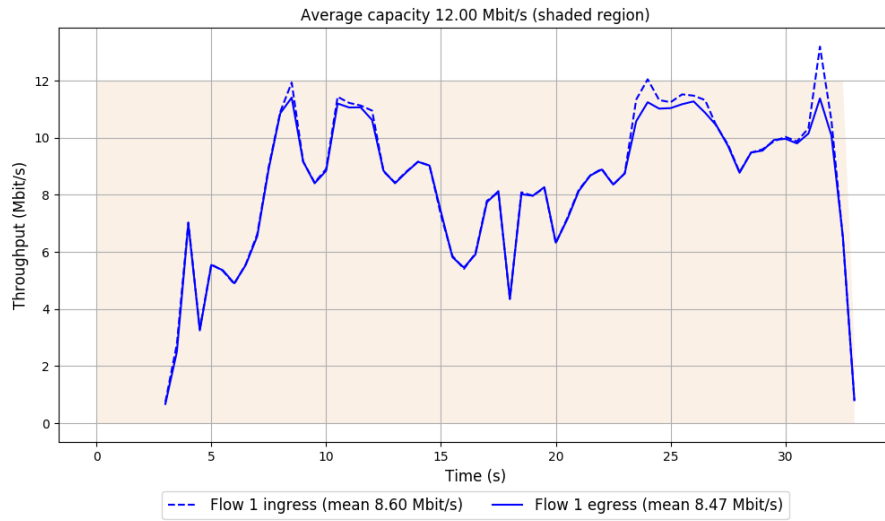
-- Flow 1:

Average throughput: 8.47 Mbit/s

95th percentile per-packet one-way delay: 11.942 ms

Loss rate: 1.51%

Run 10: Report of Vivace-latency — Data Link



Run 1: Statistics of Vivace-loss

Start at: 2018-02-27 08:56:46

End at: 2018-02-27 08:57:16

# Below is generated by plot.py at 2018-02-27 10:40:53

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 7.30 Mbit/s (60.8% utilization)

95th percentile per-packet one-way delay: 11.925 ms

Loss rate: 0.35%

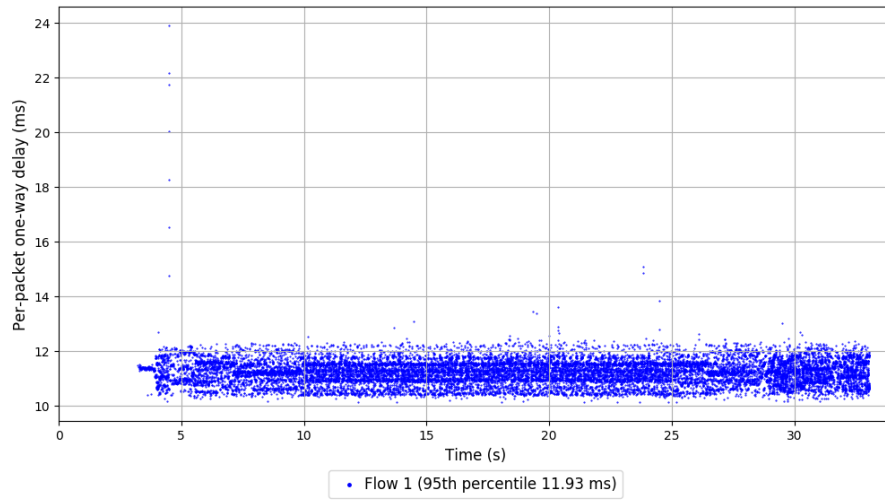
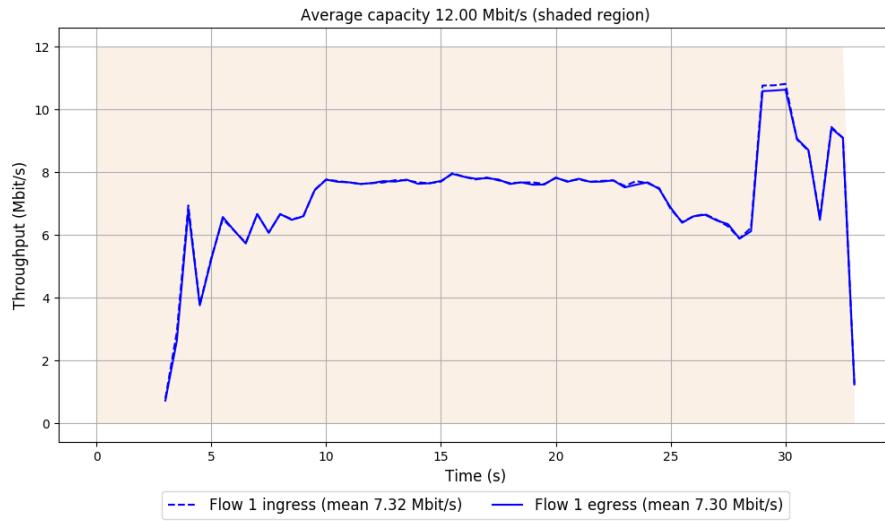
-- Flow 1:

Average throughput: 7.30 Mbit/s

95th percentile per-packet one-way delay: 11.925 ms

Loss rate: 0.35%

# Run 1: Report of Vivace-loss — Data Link



Run 2: Statistics of Vivace-loss

Start at: 2018-02-27 09:06:56

End at: 2018-02-27 09:07:26

# Below is generated by plot.py at 2018-02-27 10:40:53

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 6.42 Mbit/s (53.5% utilization)

95th percentile per-packet one-way delay: 11.918 ms

Loss rate: 0.14%

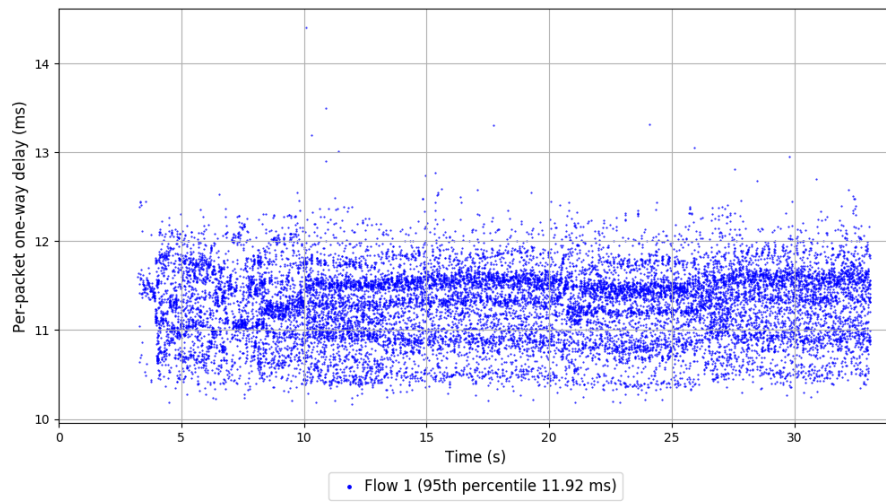
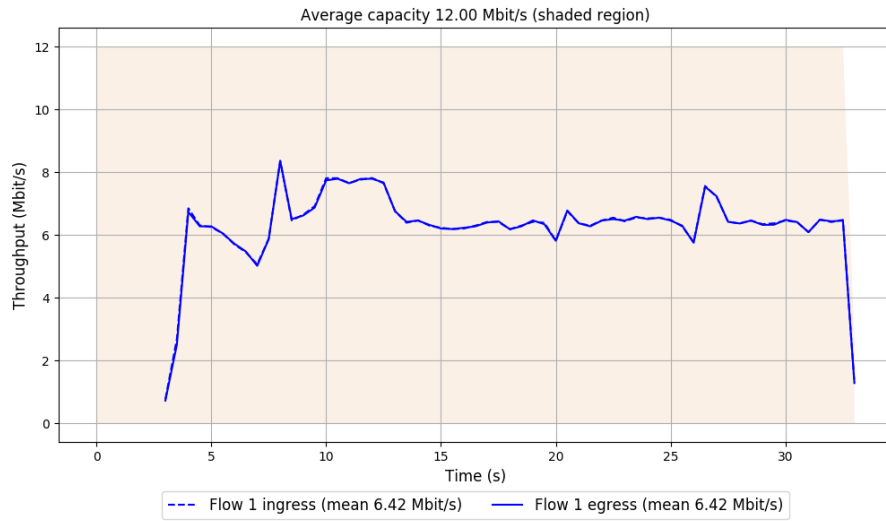
-- Flow 1:

Average throughput: 6.42 Mbit/s

95th percentile per-packet one-way delay: 11.918 ms

Loss rate: 0.14%

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



Run 3: Statistics of Vivace-loss

Start at: 2018-02-27 09:17:08

End at: 2018-02-27 09:17:38

# Below is generated by plot.py at 2018-02-27 10:40:55

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 6.41 Mbit/s (53.4% utilization)

95th percentile per-packet one-way delay: 11.964 ms

Loss rate: 0.24%

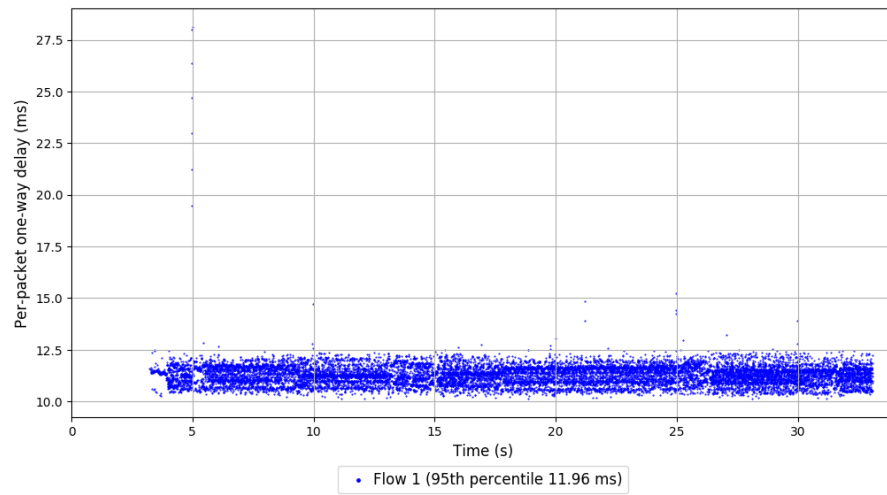
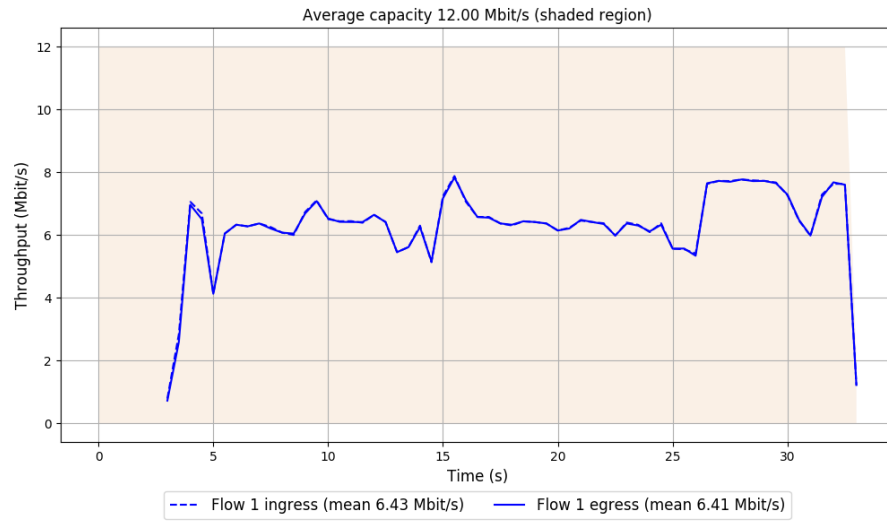
-- Flow 1:

Average throughput: 6.41 Mbit/s

95th percentile per-packet one-way delay: 11.964 ms

Loss rate: 0.24%

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



Run 4: Statistics of Vivace-loss

Start at: 2018-02-27 09:27:23

End at: 2018-02-27 09:27:53

# Below is generated by plot.py at 2018-02-27 10:41:00

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 7.00 Mbit/s (58.4% utilization)

95th percentile per-packet one-way delay: 11.998 ms

Loss rate: 0.15%

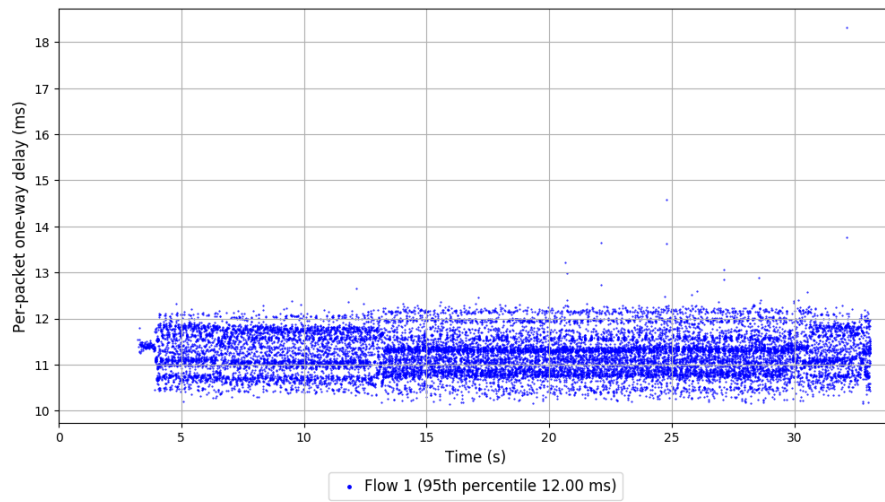
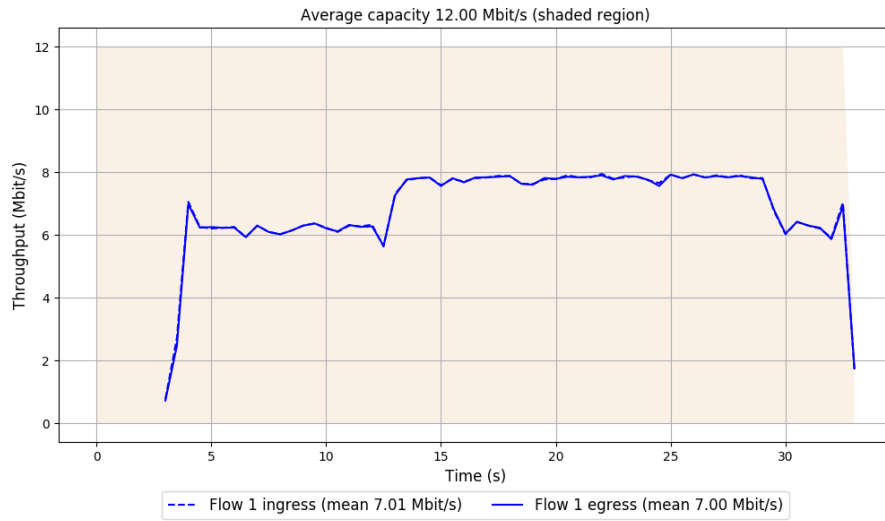
-- Flow 1:

Average throughput: 7.00 Mbit/s

95th percentile per-packet one-way delay: 11.998 ms

Loss rate: 0.15%

#### Run 4: Report of Vivace-loss — Data Link



Run 5: Statistics of Vivace-loss

Start at: 2018-02-27 09:37:38

End at: 2018-02-27 09:38:08

# Below is generated by plot.py at 2018-02-27 10:41:00

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 6.68 Mbit/s (55.7% utilization)

95th percentile per-packet one-way delay: 11.948 ms

Loss rate: 0.18%

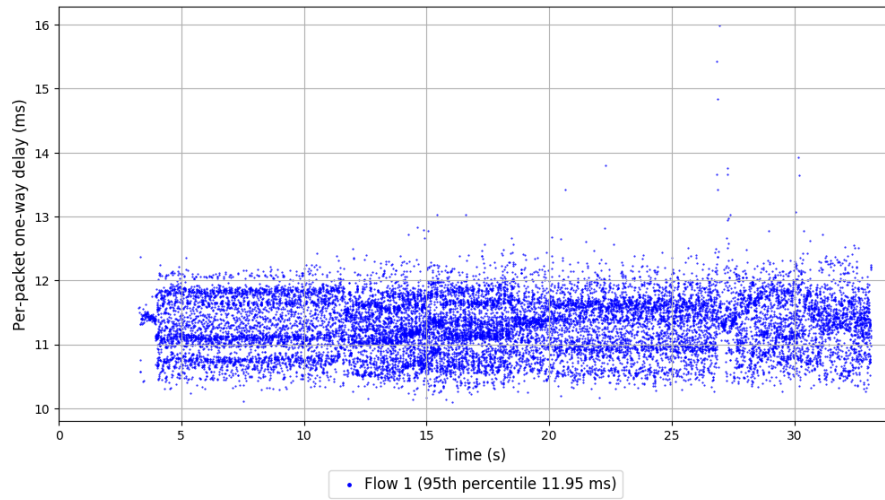
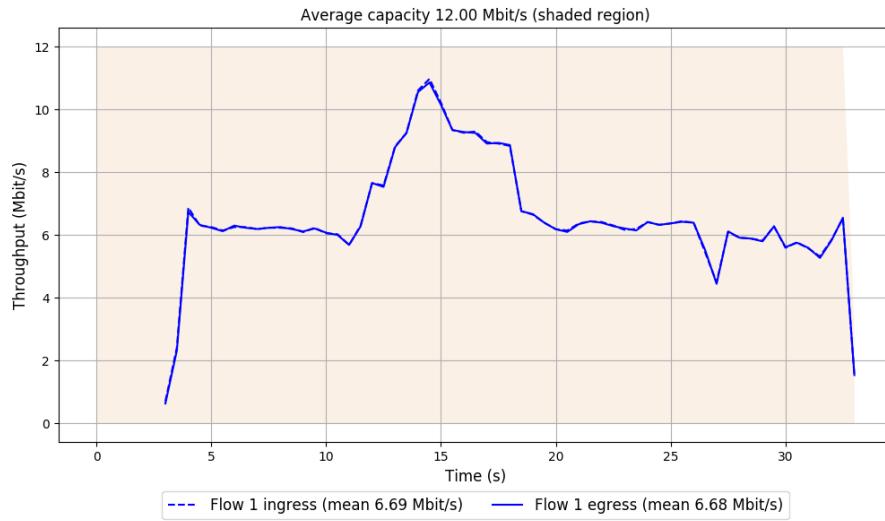
-- Flow 1:

Average throughput: 6.68 Mbit/s

95th percentile per-packet one-way delay: 11.948 ms

Loss rate: 0.18%

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



Run 6: Statistics of Vivace-loss

Start at: 2018-02-27 09:47:50

End at: 2018-02-27 09:48:20

# Below is generated by plot.py at 2018-02-27 10:41:02

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 7.25 Mbit/s (60.4% utilization)

95th percentile per-packet one-way delay: 11.943 ms

Loss rate: 0.63%

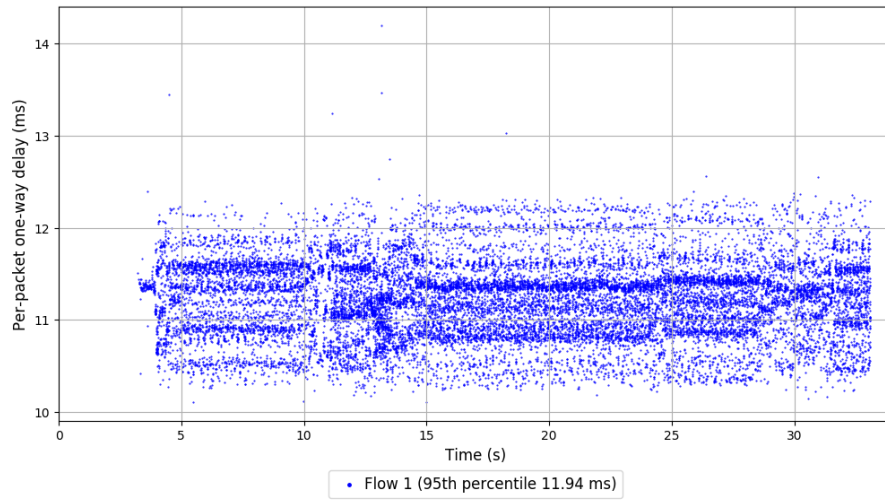
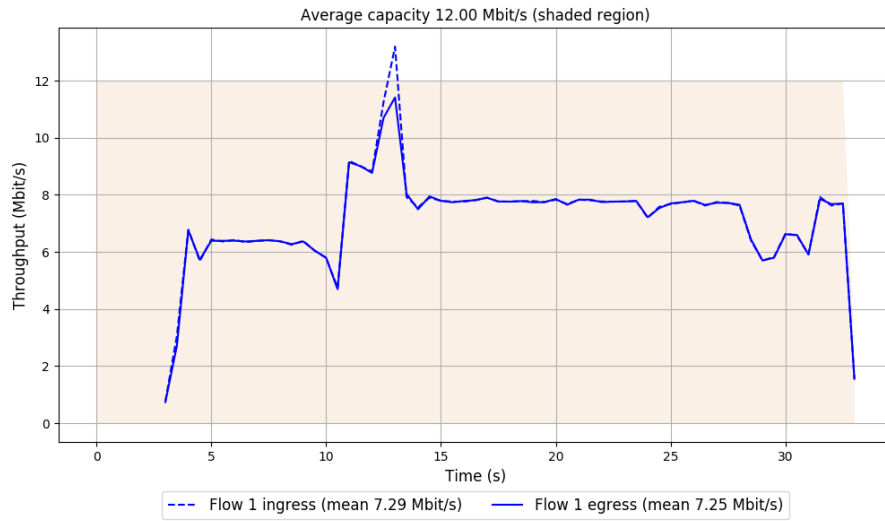
-- Flow 1:

Average throughput: 7.25 Mbit/s

95th percentile per-packet one-way delay: 11.943 ms

Loss rate: 0.63%

### Run 6: Report of Vivace-loss — Data Link



Run 7: Statistics of Vivace-loss

Start at: 2018-02-27 09:58:01

End at: 2018-02-27 09:58:31

# Below is generated by plot.py at 2018-02-27 10:41:06

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 6.75 Mbit/s (56.3% utilization)

95th percentile per-packet one-way delay: 11.851 ms

Loss rate: 0.10%

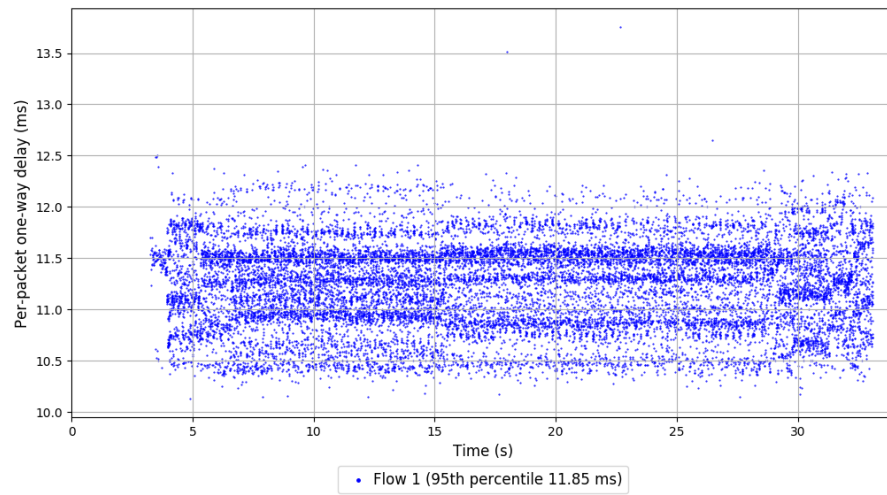
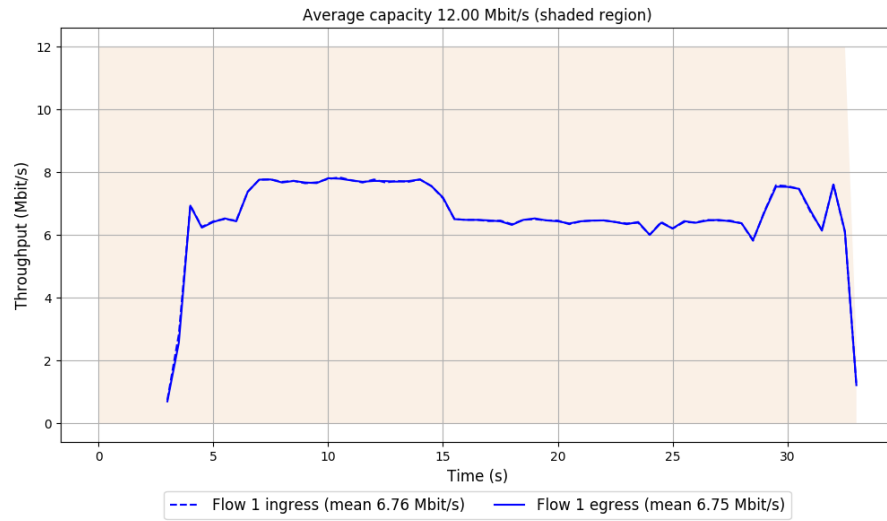
-- Flow 1:

Average throughput: 6.75 Mbit/s

95th percentile per-packet one-way delay: 11.851 ms

Loss rate: 0.10%

### Run 7: Report of Vivace-loss — Data Link



Run 8: Statistics of Vivace-loss

Start at: 2018-02-27 10:08:12

End at: 2018-02-27 10:08:42

# Below is generated by plot.py at 2018-02-27 10:41:07

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 6.27 Mbit/s (52.2% utilization)

95th percentile per-packet one-way delay: 11.919 ms

Loss rate: 0.16%

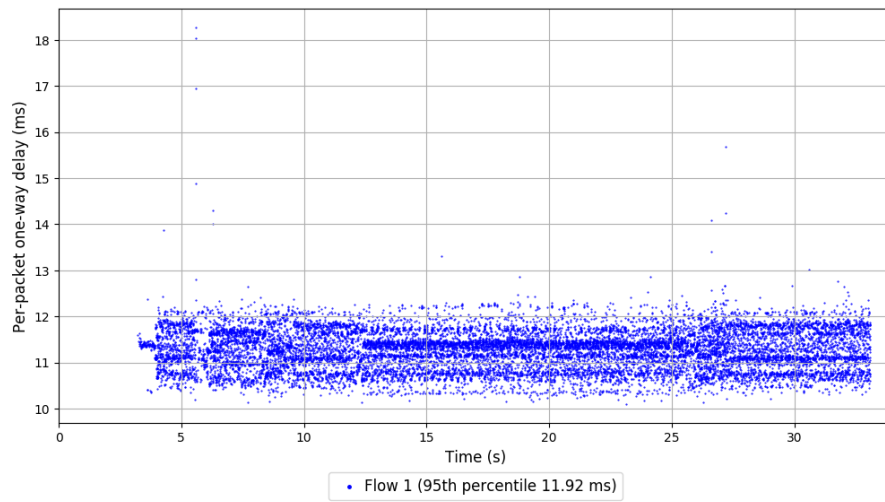
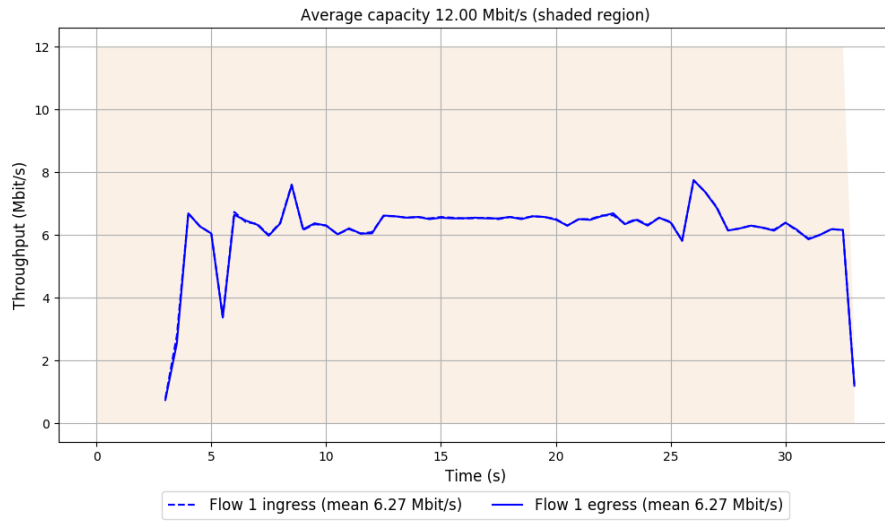
-- Flow 1:

Average throughput: 6.27 Mbit/s

95th percentile per-packet one-way delay: 11.919 ms

Loss rate: 0.16%

### Run 8: Report of Vivace-loss — Data Link



Run 9: Statistics of Vivace-loss

Start at: 2018-02-27 10:18:27

End at: 2018-02-27 10:18:57

# Below is generated by plot.py at 2018-02-27 10:41:08

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 6.25 Mbit/s (52.1% utilization)

95th percentile per-packet one-way delay: 11.992 ms

Loss rate: 0.14%

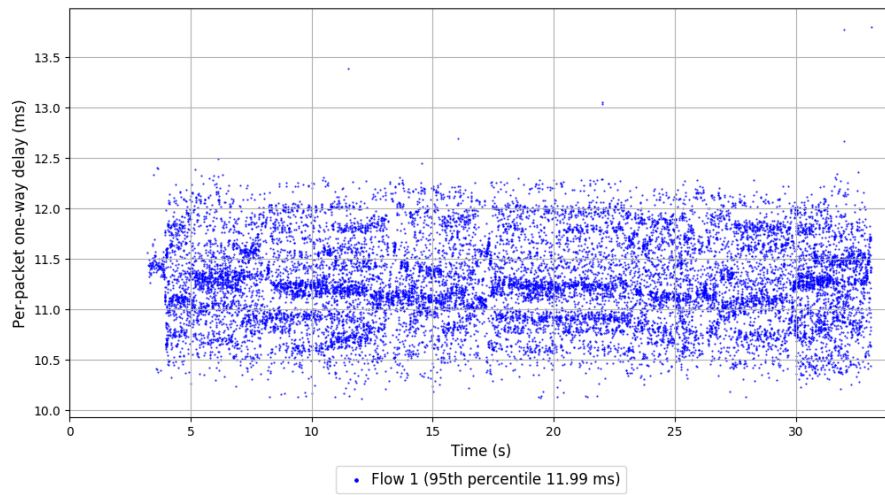
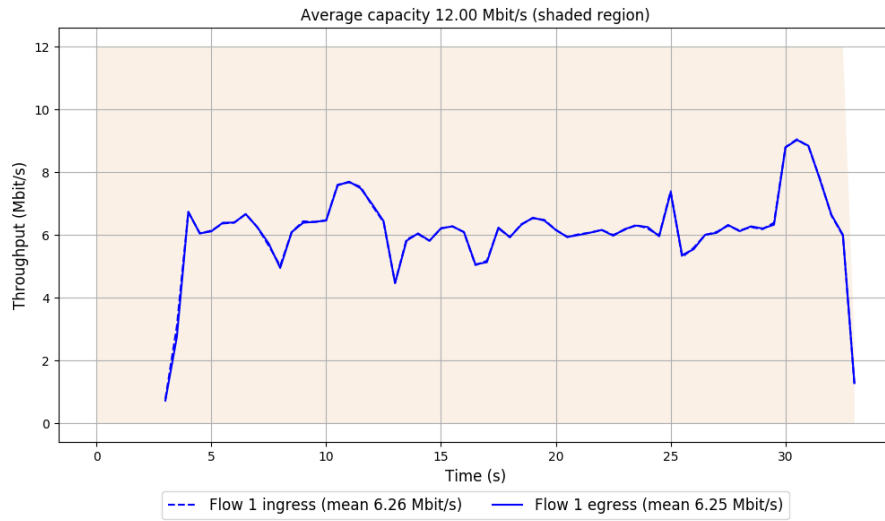
-- Flow 1:

Average throughput: 6.25 Mbit/s

95th percentile per-packet one-way delay: 11.992 ms

Loss rate: 0.14%

### Run 9: Report of Vivace-loss — Data Link



Run 10: Statistics of Vivace-loss

Start at: 2018-02-27 10:28:38

End at: 2018-02-27 10:29:08

# Below is generated by plot.py at 2018-02-27 10:41:09

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 6.77 Mbit/s (56.4% utilization)

95th percentile per-packet one-way delay: 11.935 ms

Loss rate: 0.16%

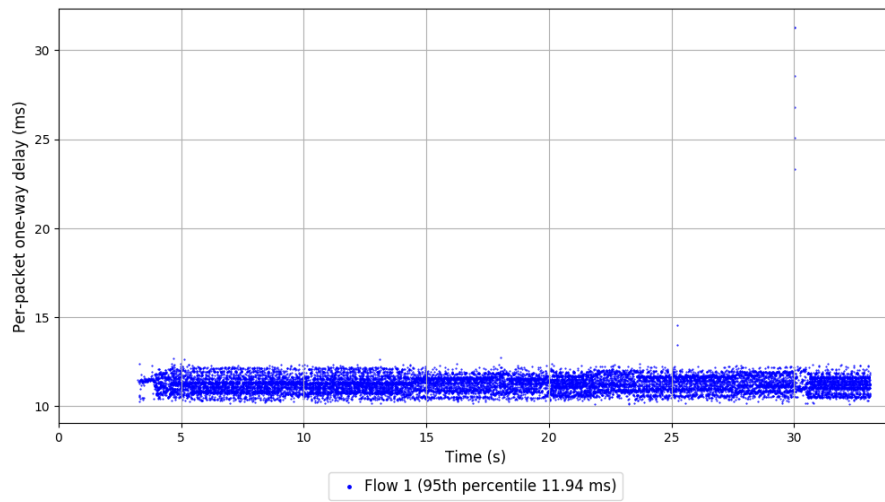
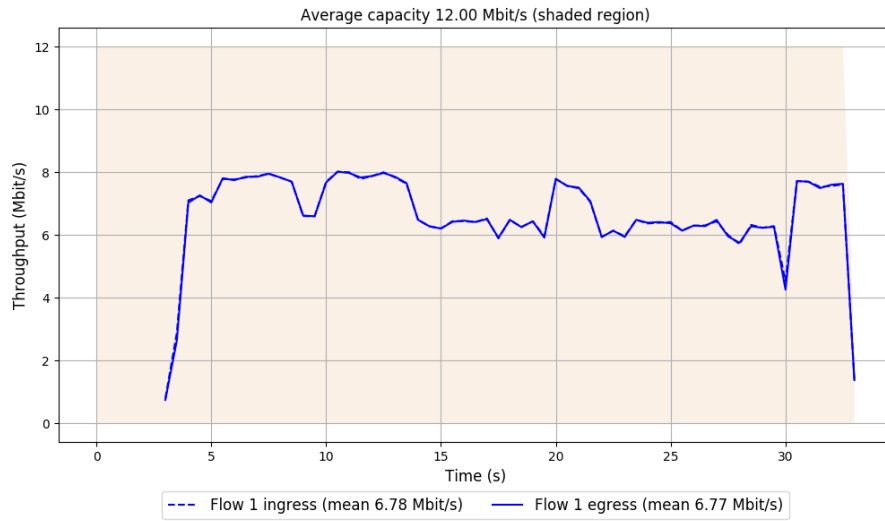
-- Flow 1:

Average throughput: 6.77 Mbit/s

95th percentile per-packet one-way delay: 11.935 ms

Loss rate: 0.16%

### Run 10: Report of Vivace-loss — Data Link



Run 1: Statistics of Vivace-LTE

Start at: 2018-02-27 09:03:33

End at: 2018-02-27 09:04:03

# Below is generated by plot.py at 2018-02-27 10:41:12

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 6.93 Mbit/s (57.8% utilization)

95th percentile per-packet one-way delay: 12.024 ms

Loss rate: 0.15%

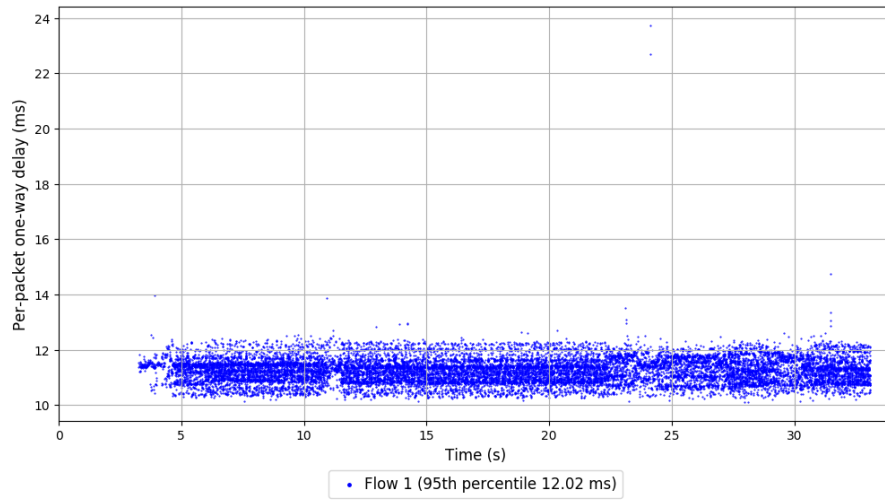
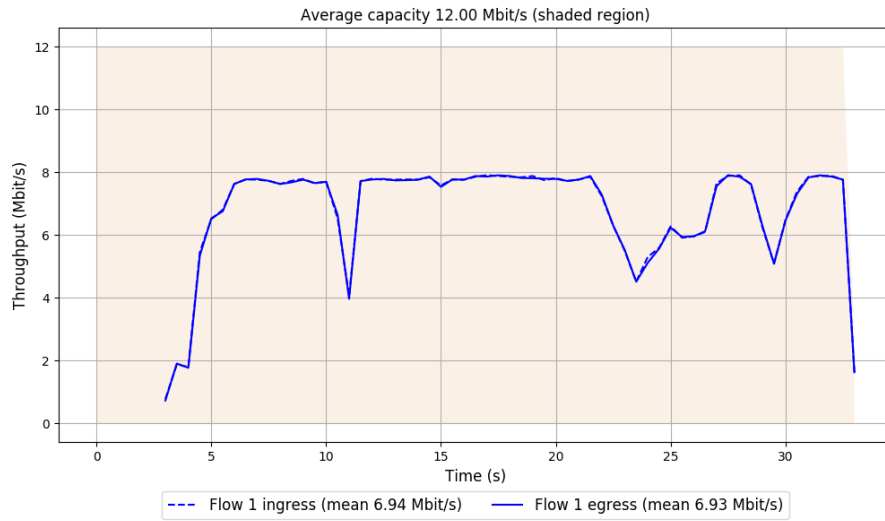
-- Flow 1:

Average throughput: 6.93 Mbit/s

95th percentile per-packet one-way delay: 12.024 ms

Loss rate: 0.15%

# Run 1: Report of Vivace-LTE — Data Link



Run 2: Statistics of Vivace-LTE

Start at: 2018-02-27 09:13:44

End at: 2018-02-27 09:14:14

# Below is generated by plot.py at 2018-02-27 10:41:15

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 6.02 Mbit/s (50.2% utilization)

95th percentile per-packet one-way delay: 12.052 ms

Loss rate: 0.26%

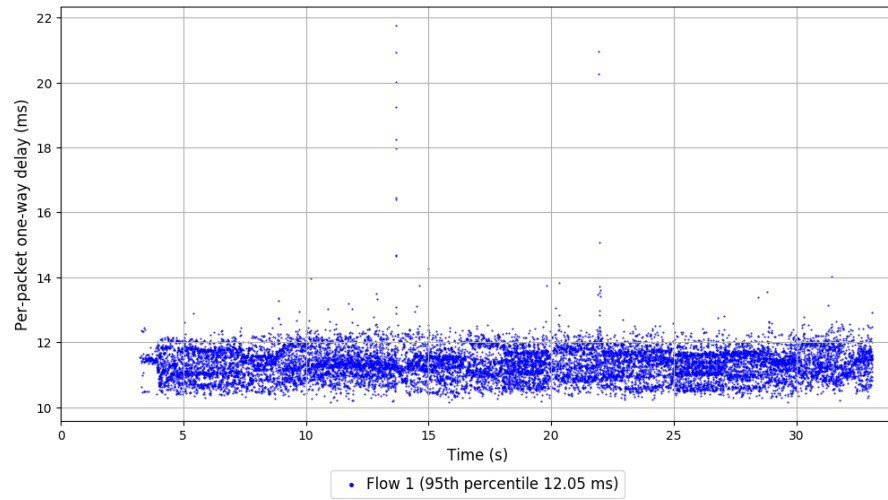
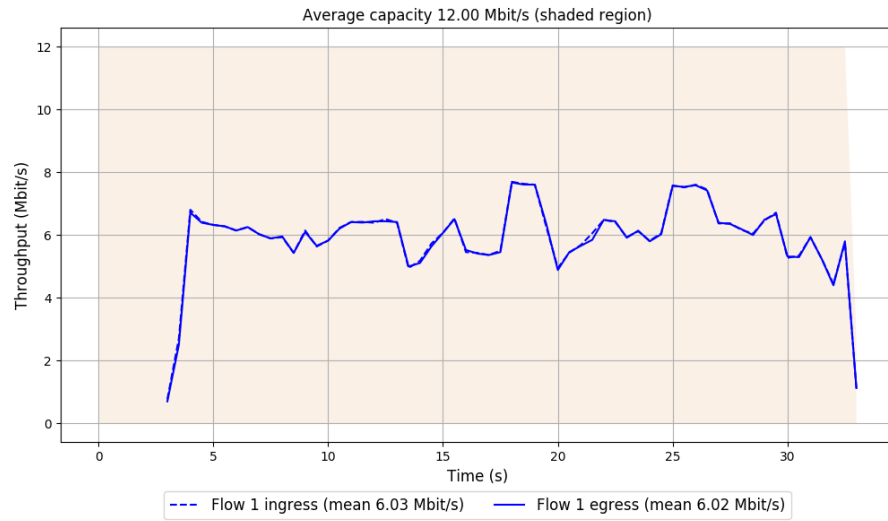
-- Flow 1:

Average throughput: 6.02 Mbit/s

95th percentile per-packet one-way delay: 12.052 ms

Loss rate: 0.26%

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



Run 3: Statistics of Vivace-LTE

Start at: 2018-02-27 09:24:00

End at: 2018-02-27 09:24:30

# Below is generated by plot.py at 2018-02-27 10:41:17

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 6.36 Mbit/s (53.0% utilization)

95th percentile per-packet one-way delay: 11.916 ms

Loss rate: 0.12%

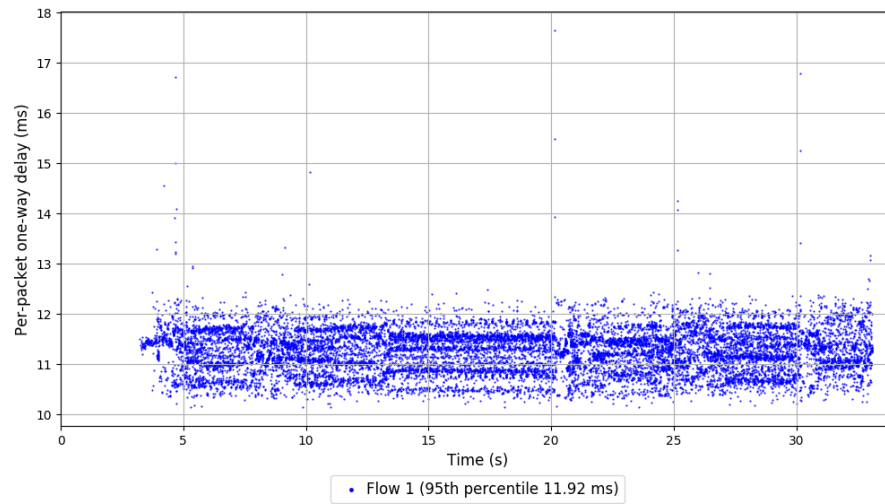
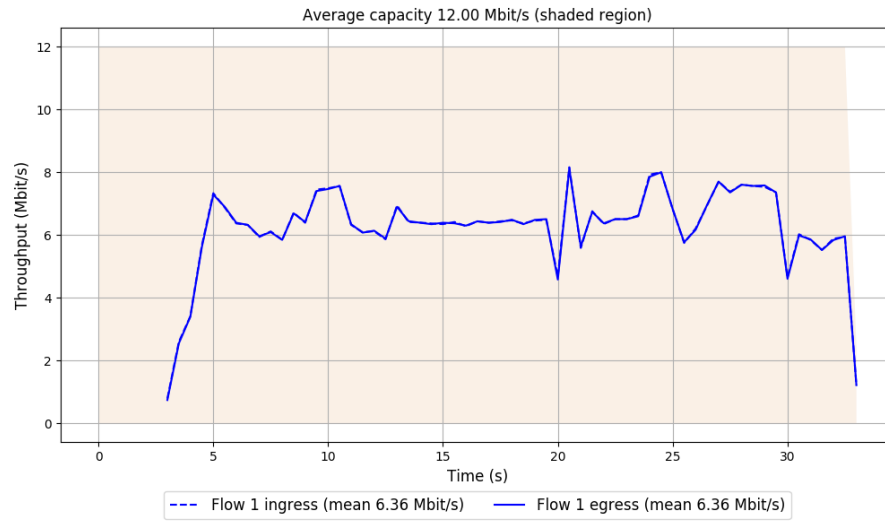
-- Flow 1:

Average throughput: 6.36 Mbit/s

95th percentile per-packet one-way delay: 11.916 ms

Loss rate: 0.12%

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



Run 4: Statistics of Vivace-LTE

Start at: 2018-02-27 09:34:14

End at: 2018-02-27 09:34:44

# Below is generated by plot.py at 2018-02-27 10:41:18

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 6.17 Mbit/s (51.4% utilization)

95th percentile per-packet one-way delay: 12.008 ms

Loss rate: 0.14%

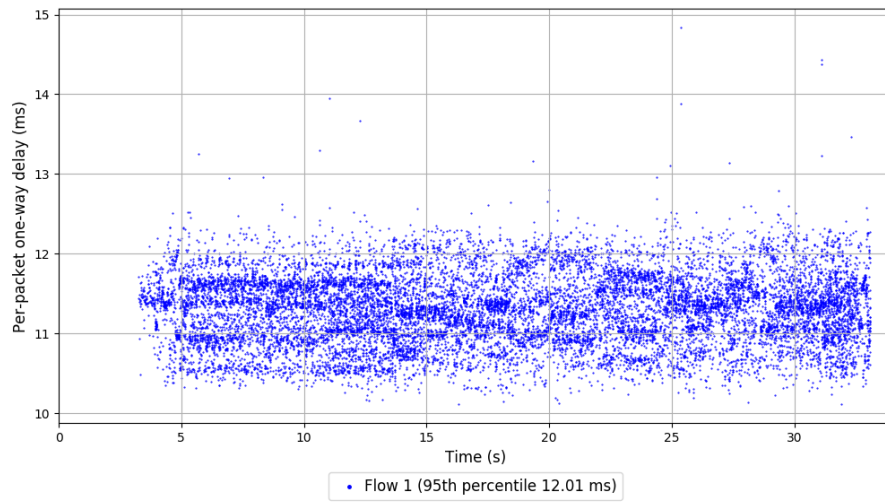
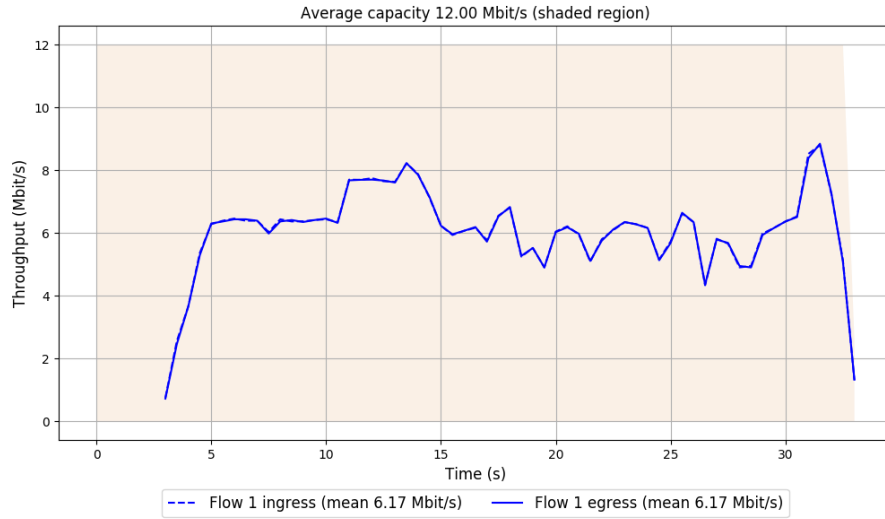
-- Flow 1:

Average throughput: 6.17 Mbit/s

95th percentile per-packet one-way delay: 12.008 ms

Loss rate: 0.14%

### Run 4: Report of Vivace-LTE — Data Link



Run 5: Statistics of Vivace-LTE

Start at: 2018-02-27 09:44:27

End at: 2018-02-27 09:44:57

# Below is generated by plot.py at 2018-02-27 10:41:21

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 6.20 Mbit/s (51.7% utilization)

95th percentile per-packet one-way delay: 11.962 ms

Loss rate: 0.13%

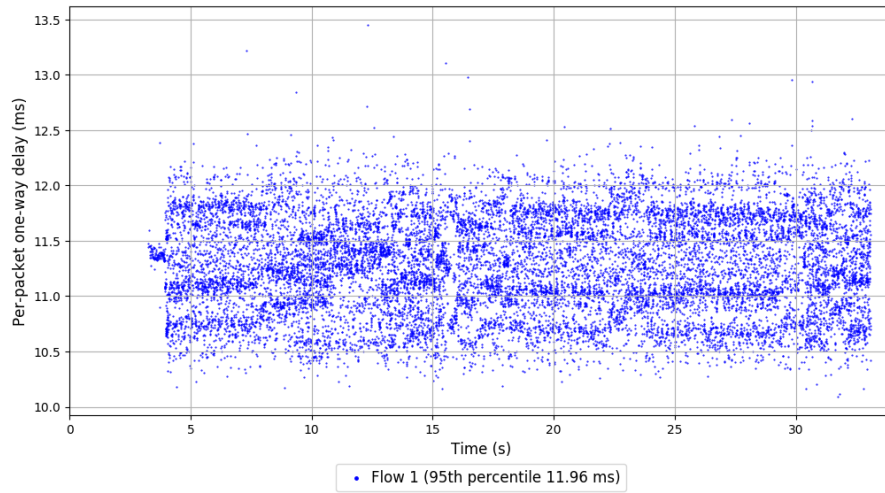
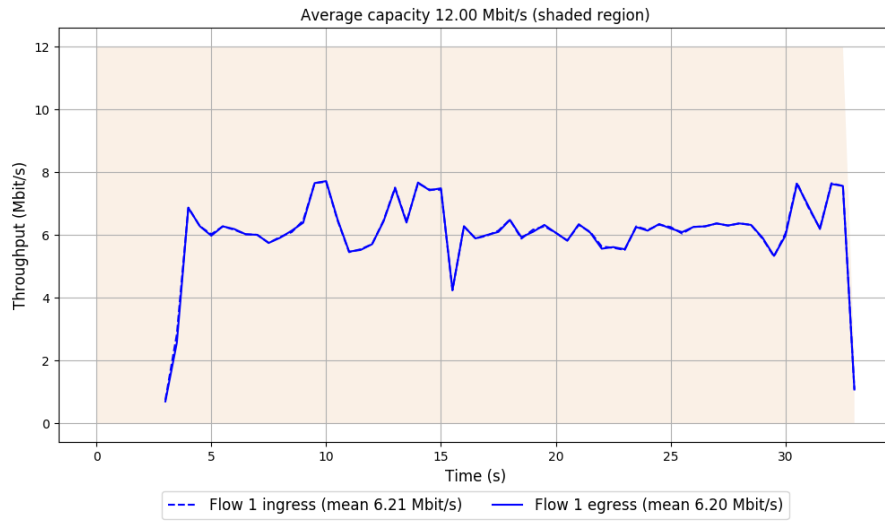
-- Flow 1:

Average throughput: 6.20 Mbit/s

95th percentile per-packet one-way delay: 11.962 ms

Loss rate: 0.13%

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



Run 6: Statistics of Vivace-LTE

Start at: 2018-02-27 09:54:38

End at: 2018-02-27 09:55:08

# Below is generated by plot.py at 2018-02-27 10:41:21

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 6.02 Mbit/s (50.2% utilization)

95th percentile per-packet one-way delay: 12.004 ms

Loss rate: 0.11%

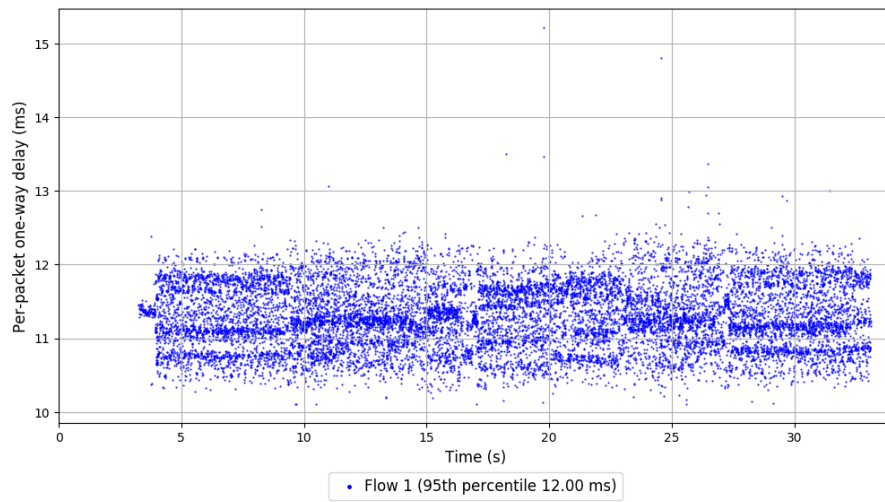
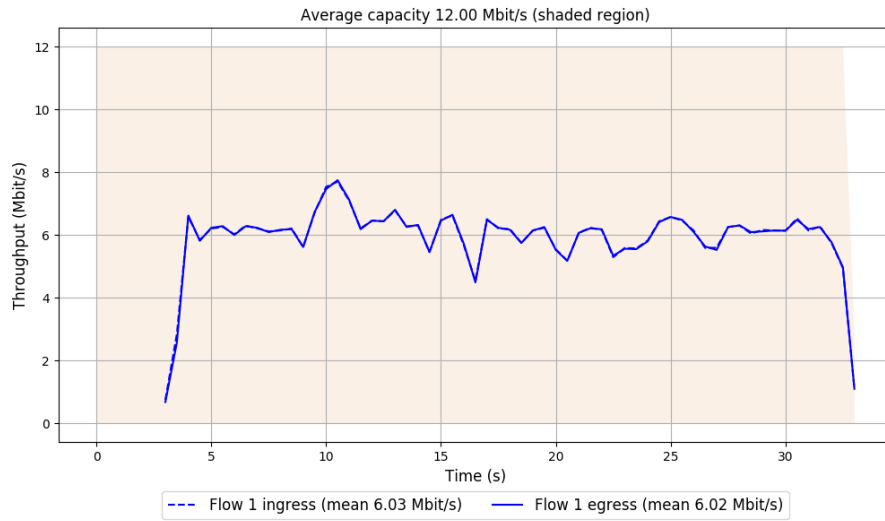
-- Flow 1:

Average throughput: 6.02 Mbit/s

95th percentile per-packet one-way delay: 12.004 ms

Loss rate: 0.11%

### Run 6: Report of Vivace-LTE — Data Link



Run 7: Statistics of Vivace-LTE

Start at: 2018-02-27 10:04:48

End at: 2018-02-27 10:05:18

# Below is generated by plot.py at 2018-02-27 10:41:23

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 6.52 Mbit/s (54.4% utilization)

95th percentile per-packet one-way delay: 11.968 ms

Loss rate: 0.12%

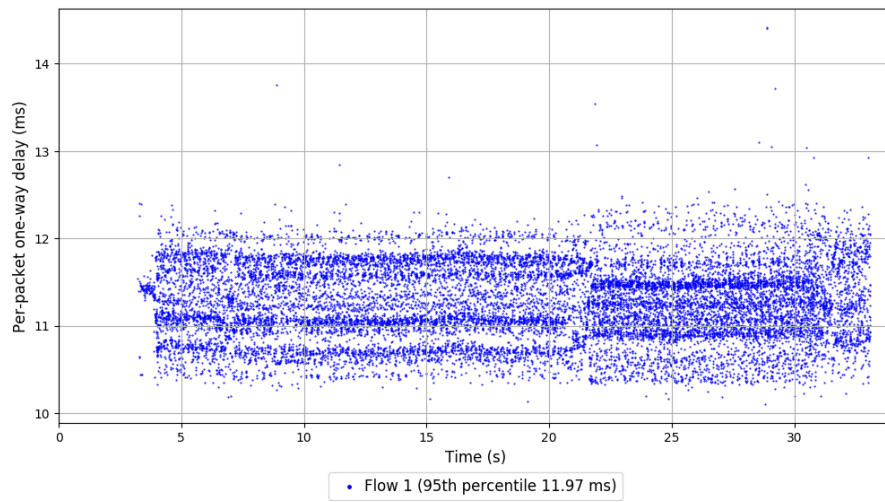
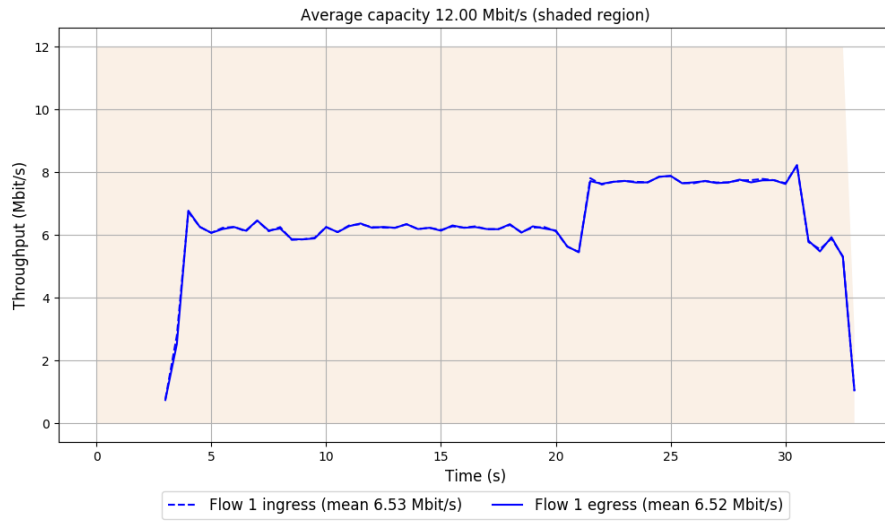
-- Flow 1:

Average throughput: 6.52 Mbit/s

95th percentile per-packet one-way delay: 11.968 ms

Loss rate: 0.12%

### Run 7: Report of Vivace-LTE — Data Link



Run 8: Statistics of Vivace-LTE

Start at: 2018-02-27 10:15:04

End at: 2018-02-27 10:15:34

# Below is generated by plot.py at 2018-02-27 10:41:24

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 7.24 Mbit/s (60.3% utilization)

95th percentile per-packet one-way delay: 11.948 ms

Loss rate: 0.31%

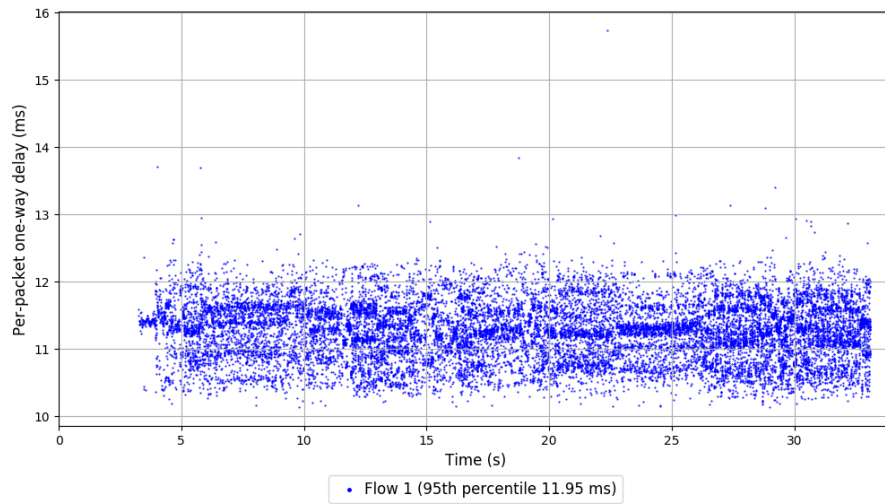
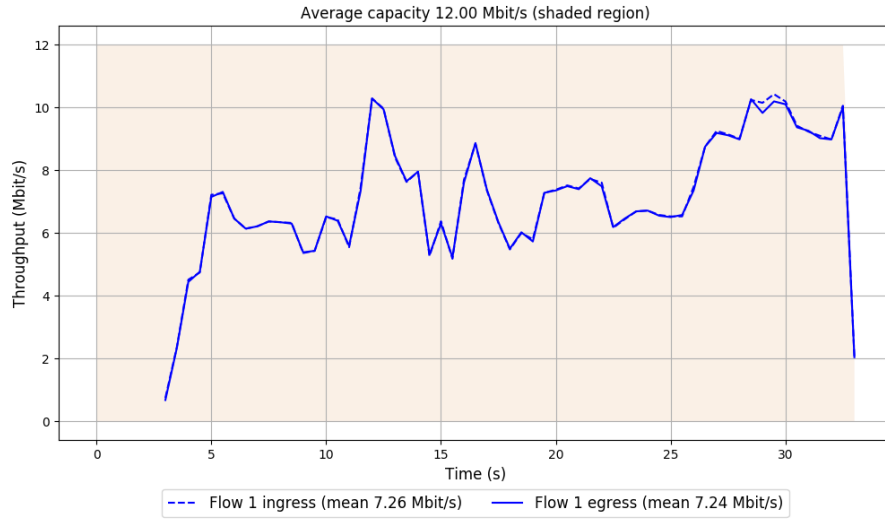
-- Flow 1:

Average throughput: 7.24 Mbit/s

95th percentile per-packet one-way delay: 11.948 ms

Loss rate: 0.31%

### Run 8: Report of Vivace-LTE — Data Link



Run 9: Statistics of Vivace-LTE

Start at: 2018-02-27 10:25:15

End at: 2018-02-27 10:25:45

# Below is generated by plot.py at 2018-02-27 10:41:24

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 7.12 Mbit/s (59.3% utilization)

95th percentile per-packet one-way delay: 11.983 ms

Loss rate: 0.30%

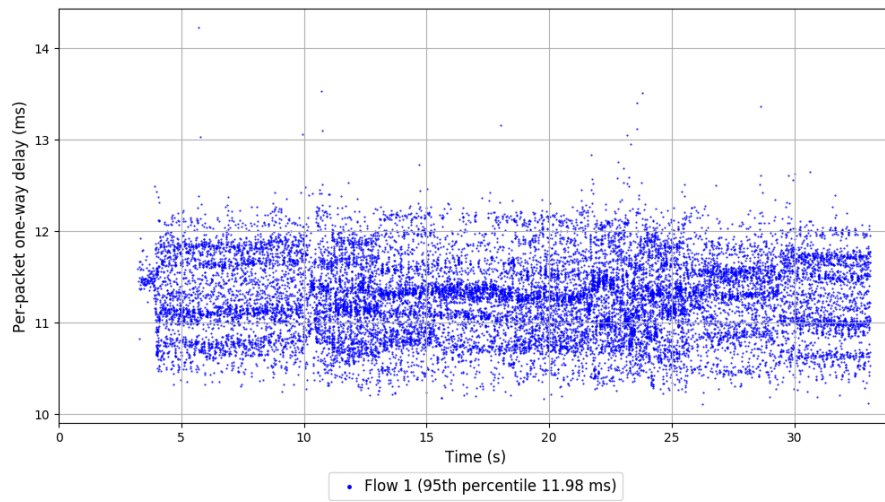
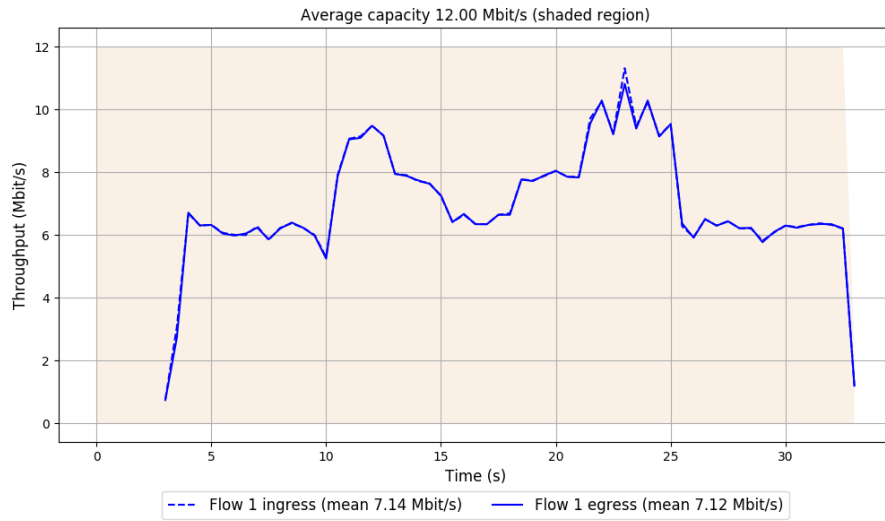
-- Flow 1:

Average throughput: 7.12 Mbit/s

95th percentile per-packet one-way delay: 11.983 ms

Loss rate: 0.30%

### Run 9: Report of Vivace-LTE — Data Link



Run 10: Statistics of Vivace-LTE

Start at: 2018-02-27 10:35:30

End at: 2018-02-27 10:36:00

# Below is generated by plot.py at 2018-02-27 10:41:25

# Datalink statistics

-- Total of 1 flow:

Average capacity: 12.00 Mbit/s

Average throughput: 7.35 Mbit/s (61.2% utilization)

95th percentile per-packet one-way delay: 12.001 ms

Loss rate: 0.16%

-- Flow 1:

Average throughput: 7.35 Mbit/s

95th percentile per-packet one-way delay: 12.001 ms

Loss rate: 0.16%

Run 10: Report of Vivace-LTE — Data Link

