Pantheon Report

Data path: GCE Sydney Ethernet (local) → GCE Tokyo Ethernet (remote).
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).
NTP offsets were measured against time.google.com and have been applied to correct the timestamps in logs.

Git summary:
branch: master @ 640164b5b17c7c6561fff57729b3b5935d8596ce
third_party/fillp @ d47f4fa1b454a5e3c0537115c5a28436dbd4b834
third_party/fillp-sheep @ daed0c84f98531712514b2231f43ec6901114ffe
third_party/genericCC @ d0153f8e594aa89e93b032143cedbdfe58e562f4
third_party/indigo @ 2601c924ea9d58d83dc4dfef0ecdfbf90c077e64d
third_party/libutp @ b3465b942e2826f2b2179eaaab4a906ce6bb7cfc3cf
third_party/pantheon-tunnel @ 6f038ed31259d366f9840f65b82cbe8f464b1b39
third_party/pcc @ 1afc958fa0d66d18b623c091a55fec872b4981e1
  M receiver/src/buffer.h
  M receiver/src/core.cpp
  M sender/src/buffer.h
  M sender/src/core.cpp
third_party/pcc-experimental @ cd43e34e3f5f5613e8acd08f6b92c4eb24f974ab
third_party/proto-quic @ 77961f1a2733a86b42f1bc8143ebc978f3ccf42
third_party/scream-reproduce @ f099118d1421aa3131b1f11ff1964974e1da3bdb2
  M src/ScreamClient
  M src/ScreamServer
third_party/sprout @ 366e35c6178b01e31da46ad8c74f9415f19a26
third_party/verus @ d4b447ea74c6c6a261149af2629562939f9a494
  M src/verus.hpp
  M tools/plot.py
third_party/vivace @ 2baf86211435ae071a32f96b7d8c504587f5d7f4
third_party/webRTC @ 3f0cc2a9061a41b6f9dde4735770d143a1fa2851
test from GCE Sydney to GCE Tokyo, 10 runs of 30s each per scheme
(mean of all runs by scheme)
<table>
<thead>
<tr>
<th>scheme</th>
<th># runs</th>
<th>mean avg tput (Mbit/s)</th>
<th>mean 95th-%ile delay (ms)</th>
<th>mean loss rate (%)</th>
</tr>
</thead>
<tbody>
<tr>
<td>TCP BBR</td>
<td>10</td>
<td>217.30</td>
<td>56.28</td>
<td>0.00</td>
</tr>
<tr>
<td>Copa</td>
<td>10</td>
<td>163.91</td>
<td>58.02</td>
<td>0.00</td>
</tr>
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<td>TCP Cubic</td>
<td>10</td>
<td>178.68</td>
<td>58.35</td>
<td>0.00</td>
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<tr>
<td>FillP</td>
<td>10</td>
<td>843.61</td>
<td>172.25</td>
<td>1.58</td>
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<tr>
<td>FillP-Sheep</td>
<td>10</td>
<td>833.53</td>
<td>103.55</td>
<td>0.16</td>
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<tr>
<td>Indigo</td>
<td>10</td>
<td>208.99</td>
<td>53.48</td>
<td>0.00</td>
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<tr>
<td>LEDBAT</td>
<td>10</td>
<td>32.17</td>
<td>53.72</td>
<td>0.00</td>
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<tr>
<td>PCC-Allegro</td>
<td>10</td>
<td>534.35</td>
<td>147.04</td>
<td>0.76</td>
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<tr>
<td>PCC-Expr</td>
<td>10</td>
<td>266.00</td>
<td>99.43</td>
<td>1.28</td>
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<tr>
<td>QUIC Cubic</td>
<td>2</td>
<td>78.00</td>
<td>51.69</td>
<td>0.00</td>
</tr>
<tr>
<td>SCReAM</td>
<td>10</td>
<td>0.21</td>
<td>53.58</td>
<td>0.00</td>
</tr>
<tr>
<td>Sprout</td>
<td>10</td>
<td>7.08</td>
<td>53.93</td>
<td>0.00</td>
</tr>
<tr>
<td>TaoVA-100x</td>
<td>7</td>
<td>87.54</td>
<td>52.61</td>
<td>0.00</td>
</tr>
<tr>
<td>TCP Vegas</td>
<td>10</td>
<td>97.77</td>
<td>55.72</td>
<td>0.00</td>
</tr>
<tr>
<td>Verus</td>
<td>10</td>
<td>246.31</td>
<td>89.27</td>
<td>0.03</td>
</tr>
<tr>
<td>PCC-Vivace</td>
<td>10</td>
<td>345.09</td>
<td>63.60</td>
<td>0.04</td>
</tr>
<tr>
<td>WebRTC media</td>
<td>10</td>
<td>1.98</td>
<td>52.53</td>
<td>0.00</td>
</tr>
</tbody>
</table>
Run 1: Statistics of TCP BBR

Start at: 2018-07-26 12:18:23
End at: 2018-07-26 12:18:53
Local clock offset: -0.041 ms
Remote clock offset: 0.076 ms

# Below is generated by plot.py at 2018-07-26 16:08:40
# Datalink statistics
-- Total of 1 flow:
Average throughput: 216.07 Mbit/s
95th percentile per-packet one-way delay: 57.183 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 216.07 Mbit/s
95th percentile per-packet one-way delay: 57.183 ms
Loss rate: 0.00%
Run 1: Report of TCP BBR — Data Link

[Graph showing throughput and packet delay over time]

- Flow 1 ingress (mean 216.07 Mbit/s)
- Flow 1 egress (mean 216.07 Mbit/s)

Flow 1 (95th percentile 57.18 ms)
Run 2: Statistics of TCP BBR

Start at: 2018-07-26 12:40:05
End at: 2018-07-26 12:40:35
Local clock offset: -0.002 ms
Remote clock offset: 0.013 ms

# Below is generated by plot.py at 2018-07-26 16:08:40
# Datalink statistics
-- Total of 1 flow:
  Average throughput: 211.23 Mbit/s
  95th percentile per-packet one-way delay: 53.691 ms
  Loss rate: 0.00%
-- Flow 1:
  Average throughput: 211.23 Mbit/s
  95th percentile per-packet one-way delay: 53.691 ms
  Loss rate: 0.00%
Run 2: Report of TCP BBR — Data Link
Run 3: Statistics of TCP BBR

Start at: 2018-07-26 13:02:10
End at: 2018-07-26 13:02:40
Local clock offset: -0.033 ms
Remote clock offset: 0.257 ms

# Below is generated by plot.py at 2018-07-26 16:08:46
# Datalink statistics
-- Total of 1 flow:
Average throughput: 220.33 Mbit/s
95th percentile per-packet one-way delay: 58.560 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 220.33 Mbit/s
95th percentile per-packet one-way delay: 58.560 ms
Loss rate: 0.00%
Run 3: Report of TCP BBR — Data Link

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Graph 1: Throughput (Mbps)

- **Flow 1 ingress** (mean 220.31 Mbps)
- **Flow 1 egress** (mean 220.33 Mbps)

Graph 2: Per-packet one-way delay (ms)

- **Flow 1** (95th percentile 58.56 ms)
Run 4: Statistics of TCP BBR

Start at: 2018-07-26 13:24:16
End at: 2018-07-26 13:24:46
Local clock offset: -0.312 ms
Remote clock offset: -0.199 ms

# Below is generated by plot.py at 2018-07-26 16:08:46
# Datalink statistics
-- Total of 1 flow:
Average throughput: 216.13 Mbit/s
95th percentile per-packet one-way delay: 56.656 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 216.13 Mbit/s
95th percentile per-packet one-way delay: 56.656 ms
Loss rate: 0.00%
Run 4: Report of TCP BBR — Data Link

![Graph 1](image1.png)

![Graph 2](image2.png)
Run 5: Statistics of TCP BBR

Local clock offset: -0.044 ms
Remote clock offset: -0.242 ms

# Below is generated by plot.py at 2018-07-26 16:08:48
# Datalink statistics
-- Total of 1 flow:
Average throughput: 222.53 Mbit/s
95th percentile per-packet one-way delay: 51.266 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 222.53 Mbit/s
95th percentile per-packet one-way delay: 51.266 ms
Loss rate: 0.00%
Run 5: Report of TCP BBR — Data Link
Run 6: Statistics of TCP BBR

Start at: 2018-07-26 14:07:50
End at: 2018-07-26 14:08:20
Local clock offset: 0.127 ms
Remote clock offset: 0.123 ms

# Below is generated by plot.py at 2018-07-26 16:08:48
# Datalink statistics
-- Total of 1 flow:
Average throughput: 213.79 Mbit/s
95th percentile per-packet one-way delay: 57.393 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 213.79 Mbit/s
95th percentile per-packet one-way delay: 57.393 ms
Loss rate: 0.00%
Run 6: Report of TCP BBR — Data Link

![Throughput vs Time Graph]

- Flow 1 ingress (mean 213.79 Mbit/s)
- Flow 1 egress (mean 213.79 Mbit/s)

![Delay vs Time Graph]

- Flow 1 (95th percentile 57.39 ms)
Run 7: Statistics of TCP BBR

Start at: 2018-07-26 14:29:34
End at: 2018-07-26 14:30:04
Local clock offset: 0.143 ms
Remote clock offset: -0.106 ms

# Below is generated by plot.py at 2018-07-26 16:08:48
# Datalink statistics
-- Total of 1 flow:
  Average throughput: 220.94 Mbit/s
  95th percentile per-packet one-way delay: 57.845 ms
  Loss rate: 0.00%
-- Flow 1:
  Average throughput: 220.94 Mbit/s
  95th percentile per-packet one-way delay: 57.845 ms
  Loss rate: 0.00%
Run 7: Report of TCP BBR — Data Link

![Graph showing throughput and packet delay over time for Flow 1.](image-url)
Run 8: Statistics of TCP BBR

Start at: 2018-07-26 14:51:48
End at: 2018-07-26 14:52:18
Local clock offset: -0.086 ms
Remote clock offset: 0.028 ms

# Below is generated by plot.py at 2018-07-26 16:08:48
# Datalink statistics
-- Total of 1 flow:
Average throughput: 219.16 Mbit/s
95th percentile per-packet one-way delay: 53.744 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 219.16 Mbit/s
95th percentile per-packet one-way delay: 53.744 ms
Loss rate: 0.00%
Run 8: Report of TCP BBR — Data Link

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**Throughput (Mbps)**

![Graph of Throughput (Mbps)](image1)

- **Flow 1 ingress (mean 219.17 Mbit/s)**
- **Flow 1 egress (mean 219.16 Mbit/s)**

**Per-packet one-way delay (ms)**

![Graph of Per-packet one-way delay (ms)](image2)

- **Flow 1 (95th percentile 53.74 ms)**
Run 9: Statistics of TCP BBR

Start at: 2018-07-26 15:13:52
End at: 2018-07-26 15:14:22
Local clock offset: 0.164 ms
Remote clock offset: 0.013 ms

# Below is generated by plot.py at 2018-07-26 16:12:35
# Datalink statistics
-- Total of 1 flow:
Average throughput: 217.04 Mbit/s
95th percentile per-packet one-way delay: 58.263 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 217.04 Mbit/s
95th percentile per-packet one-way delay: 58.263 ms
Loss rate: 0.00%
Run 9: Report of TCP BBR — Data Link
Run 10: Statistics of TCP BBR

Start at: 2018-07-26 15:35:17
End at: 2018-07-26 15:35:47
Local clock offset: 0.165 ms
Remote clock offset: -0.204 ms

# Below is generated by plot.py at 2018-07-26 16:12:35
# Datalink statistics
-- Total of 1 flow:
Average throughput: 215.80 Mbit/s
95th percentile per-packet one-way delay: 58.226 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 215.80 Mbit/s
95th percentile per-packet one-way delay: 58.226 ms
Loss rate: 0.00%
Run 10: Report of TCP BBR — Data Link
Run 1: Statistics of Copa

Start at: 2018-07-26 12:33:47
End at: 2018-07-26 12:34:17
Local clock offset: 0.17 ms
Remote clock offset: -0.149 ms

# Below is generated by plot.py at 2018-07-26 16:15:22
# Datalink statistics
-- Total of 1 flow:
Average throughput: 177.37 Mbit/s
95th percentile per-packet one-way delay: 56.604 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 177.37 Mbit/s
95th percentile per-packet one-way delay: 56.604 ms
Loss rate: 0.00%
Run 1: Report of Copa — Data Link

![Graph of throughput and delay over time](image)

- Flow 1 ingress (mean 177.37 Mbit/s)
- Flow 1 egress (mean 177.37 Mbit/s)

![Graph of packet delay](image)

- Flow 1 (95th percentile 56.60 ms)
Run 2: Statistics of Copa

Start at: 2018-07-26 12:55:40
End at: 2018-07-26 12:56:10
Local clock offset: -0.184 ms
Remote clock offset: -0.206 ms

# Below is generated by plot.py at 2018-07-26 16:15:22
# Datalink statistics
-- Total of 1 flow:
Average throughput: 155.53 Mbit/s
95th percentile per-packet one-way delay: 62.308 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 155.53 Mbit/s
95th percentile per-packet one-way delay: 62.308 ms
Loss rate: 0.00%
Run 3: Statistics of Copa

Start at: 2018-07-26 13:17:47
End at: 2018-07-26 13:18:17
Local clock offset: -0.082 ms
Remote clock offset: 1.426 ms

# Below is generated by plot.py at 2018-07-26 16:18:21
# Datalink statistics
-- Total of 1 flow:
  Average throughput: 252.97 Mbit/s
  95th percentile per-packet one-way delay: 62.084 ms
  Loss rate: 0.00%
-- Flow 1:
  Average throughput: 252.97 Mbit/s
  95th percentile per-packet one-way delay: 62.084 ms
  Loss rate: 0.00%
Run 3: Report of Copa — Data Link

- Figure 1: Throughput (Mbps) over time for Flow 1 ingress (mean 252.97 Mbps) and Flow 1 egress (mean 252.97 Mbps).

- Figure 2: Per-packet one-way delay (ms) over time for Flow 1 (95th percentile 62.08 ms).
Run 4: Statistics of Copa

Start at: 2018-07-26 13:39:45  
End at: 2018-07-26 13:40:15  
Local clock offset: -0.121 ms  
Remote clock offset: -0.036 ms  

# Below is generated by plot.py at 2018-07-26 16:20:43  
# Datalink statistics  
-- Total of 1 flow:  
Average throughput: 309.21 Mbit/s  
95th percentile per-packet one-way delay: 60.421 ms  
Loss rate: 0.00%  
-- Flow 1:  
Average throughput: 309.21 Mbit/s  
95th percentile per-packet one-way delay: 60.421 ms  
Loss rate: 0.00%
Run 4: Report of Copa — Data Link

![Graph of Throughput and Delay](image)

- Flow 1 ingress (mean 309.18 Mbit/s)
- Flow 1 egress (mean 309.21 Mbit/s)

- Flow 1 (95th percentile 60.42 ms)
Run 5: Statistics of Copa

Start at: 2018-07-26 14:01:29
End at: 2018-07-26 14:01:59
Local clock offset: 0.198 ms
Remote clock offset: -0.051 ms

# Below is generated by plot.py at 2018-07-26 16:20:43
# Datalink statistics
-- Total of 1 flow:
Average throughput: 105.94 Mbit/s
95th percentile per-packet one-way delay: 54.813 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 105.94 Mbit/s
95th percentile per-packet one-way delay: 54.813 ms
Loss rate: 0.00%
Run 5: Report of Copa — Data Link
Run 6: Statistics of Copa

Start at: 2018-07-26 14:23:07
End at: 2018-07-26 14:23:37
Local clock offset: 0.058 ms
Remote clock offset: 0.039 ms

# Below is generated by plot.py at 2018-07-26 16:20:43
# Datalink statistics
-- Total of 1 flow:
Average throughput: 190.20 Mbit/s
95th percentile per-packet one-way delay: 61.859 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 190.20 Mbit/s
95th percentile per-packet one-way delay: 61.859 ms
Loss rate: 0.00%
Run 6: Report of Copa — Data Link
Run 7: Statistics of Copa

Start at: 2018-07-26 14:44:58
End at: 2018-07-26 14:45:28
Local clock offset: -0.208 ms
Remote clock offset: -0.036 ms

# Below is generated by plot.py at 2018-07-26 16:22:54
# Datalink statistics
-- Total of 1 flow:
Average throughput: 265.56 Mbit/s
95th percentile per-packet one-way delay: 60.242 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 265.56 Mbit/s
95th percentile per-packet one-way delay: 60.242 ms
Loss rate: 0.00%
Run 7: Report of Copa — Data Link
Run 8: Statistics of Copa

Start at: 2018-07-26 15:07:28
End at: 2018-07-26 15:07:58
Local clock offset: 0.229 ms
Remote clock offset: 0.028 ms

# Below is generated by plot.py at 2018-07-26 16:22:54
# Datalink statistics
-- Total of 1 flow:
Average throughput: 70.41 Mbit/s
95th percentile per-packet one-way delay: 52.791 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 70.41 Mbit/s
95th percentile per-packet one-way delay: 52.791 ms
Loss rate: 0.00%
Run 8: Report of Copa — Data Link
Run 9: Statistics of Copa

Start at: 2018-07-26 15:29:06
End at: 2018-07-26 15:29:36
Local clock offset: 0.015 ms
Remote clock offset: 1.107 ms

# Below is generated by plot.py at 2018-07-26 16:22:54
# Datalink statistics
-- Total of 1 flow:
Average throughput: 50.64 Mbit/s
95th percentile per-packet one-way delay: 54.440 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 50.64 Mbit/s
95th percentile per-packet one-way delay: 54.440 ms
Loss rate: 0.00%
Run 9: Report of Copa — Data Link
Run 10: Statistics of Copa

Start at: 2018-07-26 15:50:54
End at: 2018-07-26 15:51:24
Local clock offset: -0.0 ms
Remote clock offset: 1.238 ms

# Below is generated by plot.py at 2018-07-26 16:22:54
# Datalink statistics
-- Total of 1 flow:
  Average throughput: 61.22 Mbit/s
  95th percentile per-packet one-way delay: 54.649 ms
  Loss rate: 0.00%
-- Flow 1:
  Average throughput: 61.22 Mbit/s
  95th percentile per-packet one-way delay: 54.649 ms
  Loss rate: 0.00%
Run 10: Report of Copa — Data Link
Run 1: Statistics of TCP Cubic

End at: 2018-07-26 12:28:11
Local clock offset: -0.119 ms
Remote clock offset: -0.093 ms

# Below is generated by plot.py at 2018-07-26 16:22:54
# Datalink statistics
-- Total of 1 flow:
  Average throughput: 155.79 Mbit/s
  95th percentile per-packet one-way delay: 60.407 ms
  Loss rate: 0.00%
-- Flow 1:
  Average throughput: 155.79 Mbit/s
  95th percentile per-packet one-way delay: 60.407 ms
  Loss rate: 0.00%
Run 1: Report of TCP Cubic — Data Link

![Graph of throughput over time for flow 1 ingress and egress, showing fluctuations and trends.]

![Graph of per-packet one-way delay for flow 1, highlighting spikes and average delay.]

Flow 1 (95th percentile 60.41 ms)
Run 2: Statistics of TCP Cubic

Start at: 2018-07-26 12:49:29
End at: 2018-07-26 12:50:00
Local clock offset: -0.015 ms
Remote clock offset: -0.047 ms

# Below is generated by plot.py at 2018-07-26 16:22:54
# Datalink statistics
-- Total of 1 flow:
Average throughput: 206.90 Mbit/s
95th percentile per-packet one-way delay: 59.168 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 206.90 Mbit/s
95th percentile per-packet one-way delay: 59.168 ms
Loss rate: 0.00%
Run 2: Report of TCP Cubic — Data Link
Run 3: Statistics of TCP Cubic

End at: 2018-07-26 13:12:07
Local clock offset: -0.055 ms
Remote clock offset: -0.175 ms

# Below is generated by plot.py at 2018-07-26 16:22:54
# Datalink statistics
-- Total of 1 flow:
Average throughput: 224.44 Mbit/s
95th percentile per-packet one-way delay: 59.941 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 224.44 Mbit/s
95th percentile per-packet one-way delay: 59.941 ms
Loss rate: 0.00%
Run 3: Report of TCP Cubic — Data Link

![Graph 1: Throughput vs Time](image)

![Graph 2: Packet Loss vs Time](image)
Run 4: Statistics of TCP Cubic

End at: 2018-07-26 13:34:07
Local clock offset: 0.208 ms
Remote clock offset: -1.495 ms

# Below is generated by plot.py at 2018-07-26 16:22:54
# Datalink statistics
-- Total of 1 flow:
Average throughput: 214.98 Mbit/s
95th percentile per-packet one-way delay: 58.569 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 214.98 Mbit/s
95th percentile per-packet one-way delay: 58.569 ms
Loss rate: 0.00%
Run 4: Report of TCP Cubic — Data Link

![Graph showing throughput and packet delay over time]

- **Throughput (Mbps)**
  - Flow 1 ingress (mean 214.96 Mbps)
  - Flow 1 egress (mean 214.98 Mbps)

- **Packet delay (ms)**
  - Flow 1 (95th percentile 58.57 ms)
Run 5: Statistics of TCP Cubic

Local clock offset: -0.015 ms
Remote clock offset: -0.246 ms

# Below is generated by plot.py at 2018-07-26 16:22:54
# Datalink statistics
-- Total of 1 flow:
Average throughput: 167.70 Mbit/s
95th percentile per-packet one-way delay: 54.480 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 167.70 Mbit/s
95th percentile per-packet one-way delay: 54.480 ms
Loss rate: 0.00%
Run 5: Report of TCP Cubic — Data Link

![Throughput Graph]

![Delay Graph]

- Flow 1 ingress (mean 167.70 Mbit/s)
- Flow 1 egress (mean 167.70 Mbit/s)
- Flow 1 (95th percentile 54.48 ms)
Run 6: Statistics of TCP Cubic

Start at: 2018-07-26 14:16:59
End at: 2018-07-26 14:17:29
Local clock offset: 0.037 ms
Remote clock offset: 0.183 ms

# Below is generated by plot.py at 2018-07-26 16:22:54
# Datalink statistics
-- Total of 1 flow:
Average throughput: 135.15 Mbit/s
95th percentile per-packet one-way delay: 56.963 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 135.15 Mbit/s
95th percentile per-packet one-way delay: 56.963 ms
Loss rate: 0.00%
Run 6: Report of TCP Cubic — Data Link

![Graph of throughput vs time showing fluctuations over 30 seconds.]

Throughput (Mbps)

Time (s)

Flow 1 ingress (mean 135.14 Mbit/s) and Flow 1 egress (mean 135.15 Mbit/s)

![Graph of per-packet one-way delay vs time showing variation over 30 seconds.]

Per-packet one-way delay (ms)

Time (s)

Flow 1 (95th percentile 56.96 ms)
Run 7: Statistics of TCP Cubic

Start at: 2018-07-26 14:38:51
End at: 2018-07-26 14:39:21
Local clock offset: -0.026 ms
Remote clock offset: 1.31 ms

# Below is generated by plot.py at 2018-07-26 16:22:54
# Datalink statistics
-- Total of 1 flow:
Average throughput: 161.09 Mbit/s
95th percentile per-packet one-way delay: 55.575 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 161.09 Mbit/s
95th percentile per-packet one-way delay: 55.575 ms
Loss rate: 0.00%
Run 7: Report of TCP Cubic — Data Link

![Graph of throughput over time for Flow 1 ingress and egress](image1)

![Graph of per-packet one-way delay for Flow 1](image2)
Run 8: Statistics of TCP Cubic

Start at: 2018-07-26 15:01:16
End at: 2018-07-26 15:01:46
Local clock offset: -0.106 ms
Remote clock offset: -0.128 ms

# Below is generated by plot.py at 2018-07-26 16:22:54
# Datalink statistics
-- Total of 1 flow:
Average throughput: 140.75 Mbit/s
95th percentile per-packet one-way delay: 56.976 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 140.75 Mbit/s
95th percentile per-packet one-way delay: 56.976 ms
Loss rate: 0.00%
Run 8: Report of TCP Cubic — Data Link
Run 9: Statistics of TCP Cubic

End at: 2018-07-26 15:23:28
Local clock offset: 0.05 ms
Remote clock offset: 1.412 ms

# Below is generated by plot.py at 2018-07-26 16:24:29
# Datalink statistics
-- Total of 1 flow:
Average throughput: 221.45 Mbit/s
95th percentile per-packet one-way delay: 60.043 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 221.45 Mbit/s
95th percentile per-packet one-way delay: 60.043 ms
Loss rate: 0.00%
Run 9: Report of TCP Cubic — Data Link

![TCP Cubic Data Link Graph](image)

![TCP Cubic Data Link Graph](image)
Run 10: Statistics of TCP Cubic

Start at: 2018-07-26 15:44:47
End at: 2018-07-26 15:45:17
Local clock offset: 0.172 ms
Remote clock offset: 1.191 ms

# Below is generated by plot.py at 2018-07-26 16:24:29
# Datalink statistics
-- Total of 1 flow:
Average throughput: 158.58 Mbit/s
95th percentile per-packet one-way delay: 61.425 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 158.58 Mbit/s
95th percentile per-packet one-way delay: 61.425 ms
Loss rate: 0.00%
Run 10: Report of TCP Cubic — Data Link

![Graph of Throughput vs Time](image1)

![Graph of Per-Packet End-to-End Delay vs Time](image2)
Run 1: Statistics of FillP

Start at: 2018-07-26 12:31:04
End at: 2018-07-26 12:31:35
Local clock offset: -0.041 ms
Remote clock offset: 0.318 ms

# Below is generated by plot.py at 2018-07-26 16:41:27
# Datalink statistics
-- Total of 1 flow:
Average throughput: 828.46 Mbit/s
95th percentile per-packet one-way delay: 149.024 ms
Loss rate: 1.70%
-- Flow 1:
Average throughput: 828.46 Mbit/s
95th percentile per-packet one-way delay: 149.024 ms
Loss rate: 1.70%
Run 1: Report of FillP — Data Link

Throughput (Mbps/s)

Time (s)

Flow 1 ingress (mean 842.88 Mbps)  Flow 1 egress (mean 828.46 Mbps)

Per packet one way delay (ms)

Time (s)

Flow 1 (95th percentile 149.02 ms)
Run 2: Statistics of FillP

Start at: 2018-07-26 12:53:00
End at: 2018-07-26 12:53:30
Local clock offset: -0.011 ms
Remote clock offset: -0.119 ms

# Below is generated by plot.py at 2018-07-26 16:41:27
# Datalink statistics
-- Total of 1 flow:
Average throughput: 763.37 Mbit/s
95th percentile per-packet one-way delay: 241.667 ms
Loss rate: 0.69%
-- Flow 1:
Average throughput: 763.37 Mbit/s
95th percentile per-packet one-way delay: 241.667 ms
Loss rate: 0.69%
Run 2: Report of FillP — Data Link

Throughput (Mbit/s)

Time (s)

Flow 1 ingress (mean 768.73 Mbit/s) Flow 1 egress (mean 763.37 Mbit/s)

Packet one way delay (ms)

Flow 1 (95th percentile 241.67 ms)
Run 3: Statistics of FillP

Start at: 2018-07-26 13:15:04
End at: 2018-07-26 13:15:34
Local clock offset: -0.083 ms
Remote clock offset: -0.149 ms

# Below is generated by plot.py at 2018-07-26 16:43:26
# Datalink statistics
-- Total of 1 flow:
Average throughput: 869.87 Mbit/s
95th percentile per-packet one-way delay: 220.986 ms
Loss rate: 1.11%
-- Flow 1:
Average throughput: 869.87 Mbit/s
95th percentile per-packet one-way delay: 220.986 ms
Loss rate: 1.11%
Run 3: Report of FillP — Data Link

Graph 1: Throughput (Mbps)
- Flow 1 ingress (mean 879.72 Mbps)
- Flow 1 egress (mean 869.87 Mbps)

Graph 2: Per packet one-way delay (ms)
- Flow 1 (95th percentile 220.99 ms)
Run 4: Statistics of FillP

Start at: 2018-07-26 13:37:03
End at: 2018-07-26 13:37:33
Local clock offset: 0.07 ms
Remote clock offset: -0.099 ms

# Below is generated by plot.py at 2018-07-26 16:43:26
# Datalink statistics
-- Total of 1 flow:
Average throughput: 827.14 Mbit/s
95th percentile per-packet one-way delay: 223.846 ms
Loss rate: 0.31%
-- Flow 1:
Average throughput: 827.14 Mbit/s
95th percentile per-packet one-way delay: 223.846 ms
Loss rate: 0.31%
Run 4: Report of FillP — Data Link

![Graph showing throughput and per-packet one-way delay over time.](image)

Flow 1 ingress (mean 829.74 Mbit/s) — Flow 1 egress (mean 827.14 Mbit/s)

Flow 1 (95th percentile 223.85 ms)
Run 5: Statistics of FillP

End at: 2018-07-26 13:59:17
Local clock offset: -0.088 ms
Remote clock offset: -0.217 ms

# Below is generated by plot.py at 2018-07-26 16:43:56
# Datalink statistics
-- Total of 1 flow:
Average throughput: 818.72 Mbit/s
95th percentile per-packet one-way delay: 181.050 ms
Loss rate: 3.25%
-- Flow 1:
Average throughput: 818.72 Mbit/s
95th percentile per-packet one-way delay: 181.050 ms
Loss rate: 3.25%
Run 5: Report of FillP — Data Link

![Graph 1: Throughput vs Time](image1)

- Flow 1 ingress (mean 846.28 Mbit/s)
- Flow 1 egress (mean 818.72 Mbit/s)

![Graph 2: Per-packet one-way delay vs Time](image2)

- Flow 1 (95th percentile 181.05 ms)
Run 6: Statistics of FillP

Start at: 2018-07-26 14:20:21
End at: 2018-07-26 14:20:51
Local clock offset: -0.217 ms
Remote clock offset: -0.236 ms

# Below is generated by plot.py at 2018-07-26 16:45:49
# Datalink statistics
-- Total of 1 flow:
Average throughput: 911.11 Mbit/s
95th percentile per-packet one-way delay: 137.521 ms
Loss rate: 0.65%
-- Flow 1:
Average throughput: 911.11 Mbit/s
95th percentile per-packet one-way delay: 137.521 ms
Loss rate: 0.65%
Run 6: Report of FillP — Data Link

Graph 1: Throughput (Mbps)
- Flow 1 ingress (mean 914.23 Mbps)
- Flow 1 egress (mean 911.11 Mbps)

Graph 2: Per-packet one way delay (ms)
- Flow 1 (95th percentile 137.52 ms)
Run 7: Statistics of FillP

Start at: 2018-07-26 14:42:15
End at: 2018-07-26 14:42:45
Local clock offset: 0.074 ms
Remote clock offset: 1.403 ms

# Below is generated by plot.py at 2018-07-26 16:45:49
# Datalink statistics
-- Total of 1 flow:
Average throughput: 837.44 Mbit/s
95th percentile per-packet one-way delay: 159.624 ms
Loss rate: 2.26%
-- Flow 1:
Average throughput: 837.44 Mbit/s
95th percentile per-packet one-way delay: 159.624 ms
Loss rate: 2.26%
Run 7: Report of FillP — Data Link
Run 8: Statistics of FillP

Start at: 2018-07-26 15:04:44
End at: 2018-07-26 15:05:14
Local clock offset: -0.029 ms
Remote clock offset: 1.326 ms

# Below is generated by plot.py at 2018-07-26 16:47:28
# Datalink statistics
-- Total of 1 flow:
Average throughput: 895.07 Mbit/s
95th percentile per-packet one-way delay: 141.258 ms
Loss rate: 1.44%
-- Flow 1:
Average throughput: 895.07 Mbit/s
95th percentile per-packet one-way delay: 141.258 ms
Loss rate: 1.44%
Run 8: Report of FillP — Data Link
Run 9: Statistics of FillP

Start at: 2018-07-26 15:26:24
End at: 2018-07-26 15:26:54
Local clock offset: 0.035 ms
Remote clock offset: -0.028 ms

# Below is generated by plot.py at 2018-07-26 17:02:26
# Datalink statistics
-- Total of 1 flow:
Average throughput: 823.07 Mbit/s
95th percentile per-packet one-way delay: 127.094 ms
Loss rate: 2.56%
-- Flow 1:
Average throughput: 823.07 Mbit/s
95th percentile per-packet one-way delay: 127.094 ms
Loss rate: 2.56%
Run 9: Report of FillP — Data Link

![Throughput Graph](image1)

![Packet Delay Graph](image2)
Run 10: Statistics of FillP

End at: 2018-07-26 15:48:41
Local clock offset: -0.011 ms
Remote clock offset: -0.208 ms

# Below is generated by plot.py at 2018-07-26 17:03:12
# Datalink statistics
-- Total of 1 flow:
Average throughput: 861.86 Mbit/s
95th percentile per-packet one-way delay: 140.413 ms
Loss rate: 1.81%
-- Flow 1:
Average throughput: 861.86 Mbit/s
95th percentile per-packet one-way delay: 140.413 ms
Loss rate: 1.81%
Run 10: Report of FillP — Data Link

Throughput (Mbps):

- Flow 1 ingress (mean 877.75 Mbps)
- Flow 1 egress (mean 861.86 Mbps)

Round-trip one-way delay (ms):

- Flow 1 (95th percentile 140.41 ms)
Run 1: Statistics of FillP-Sheep

Start at: 2018-07-26 12:20:57
End at: 2018-07-26 12:21:27
Local clock offset: -0.007 ms
Remote clock offset: 0.186 ms

# Below is generated by plot.py at 2018-07-26 17:05:30
# Datalink statistics
-- Total of 1 flow:
Average throughput: 876.38 Mbit/s
95th percentile per-packet one-way delay: 109.311 ms
Loss rate: 0.16%
-- Flow 1:
Average throughput: 876.38 Mbit/s
95th percentile per-packet one-way delay: 109.311 ms
Loss rate: 0.16%
Run 1: Report of FillP-Sheep — Data Link
Run 2: Statistics of FillP-Sheep

Start at: 2018-07-26 12:42:42
End at: 2018-07-26 12:43:12
Local clock offset: 0.116 ms
Remote clock offset: -0.112 ms

# Below is generated by plot.py at 2018-07-26 17:05:30
# Datalink statistics
-- Total of 1 flow:
Average throughput: 813.75 Mbit/s
95th percentile per-packet one-way delay: 97.450 ms
Loss rate: 0.12%
-- Flow 1:
Average throughput: 813.75 Mbit/s
95th percentile per-packet one-way delay: 97.450 ms
Loss rate: 0.12%
Run 2: Report of FillP-Sheep — Data Link

![Graph of Throughput](image1)

![Graph of One-Way Delay](image2)

*Flow 1 ingress (mean 814.79 Mbit/s)  Flow 1 egress (mean 813.75 Mbit/s)  Flow 1 (95th percentile 97.45 ms)*
Run 3: Statistics of FillP-Sheep

Start at: 2018-07-26 13:04:50
End at: 2018-07-26 13:05:20
Local clock offset: 0.068 ms
Remote clock offset: -0.327 ms

# Below is generated by plot.py at 2018-07-26 17:05:30
# Datalink statistics
-- Total of 1 flow:
  Average throughput: 778.09 Mbit/s
  95th percentile per-packet one-way delay: 106.562 ms
  Loss rate: 0.13%
-- Flow 1:
  Average throughput: 778.09 Mbit/s
  95th percentile per-packet one-way delay: 106.562 ms
  Loss rate: 0.13%
Run 3: Report of FillP-Sheep — Data Link

![Graph of network throughput over time with two lines: one for Flow 1 ingress (mean 779.23 Mbit/s) and one for Flow 1 egress (mean 778.09 Mbit/s).]

![Graph of packet one-way delay over time with a line for Flow 1 (95th percentile 106.56 ms).]
Run 4: Statistics of FillP-Sheep

Start at: 2018-07-26 13:26:50
Local clock offset: -0.294 ms
Remote clock offset: 1.439 ms

# Below is generated by plot.py at 2018-07-26 17:05:30
# Datalink statistics
-- Total of 1 flow:
Average throughput: 777.19 Mbit/s
95th percentile per-packet one-way delay: 117.259 ms
Loss rate: 0.11%
-- Flow 1:
Average throughput: 777.19 Mbit/s
95th percentile per-packet one-way delay: 117.259 ms
Loss rate: 0.11%
Run 4: Report of FillP-Sheep — Data Link

![Graph of Throughput (Mbps)](image1)

- Flow 1 ingress (mean 778.09 Mbps)
- Flow 1 egress (mean 777.19 Mbps)

![Graph of Per-packet one-way delay (ms)](image2)

- Flow 1 (95th percentile 117.26 ms)
Run 5: Statistics of FillP-Sheep

Local clock offset: 0.075 ms  
Remote clock offset: 1.167 ms

# Below is generated by plot.py at 2018-07-26 17:08:06  
# Datalink statistics  
-- Total of 1 flow:  
Average throughput: 844.27 Mbit/s  
95th percentile per-packet one-way delay: 100.976 ms  
Loss rate: 0.28%  
-- Flow 1:  
Average throughput: 844.27 Mbit/s  
95th percentile per-packet one-way delay: 100.976 ms  
Loss rate: 0.28%
Run 5: Report of FillP-Sheep — Data Link

![Graph showing network throughput and latency over time.]

**Throughput (Mbps)**

**Time (s)**

- **Flow 1 ingress (mean 846.69 Mbps)**
- **Flow 1 egress (mean 844.27 Mbps)**

**Per-packet one-way delay (ms)**

- **Flow 1 (95th percentile 100.98 ms)**
Run 6: Statistics of FillP-Sheep

Start at: 2018-07-26 14:10:27
End at: 2018-07-26 14:10:57
Local clock offset: -0.044 ms
Remote clock offset: 1.216 ms

# Below is generated by plot.py at 2018-07-26 17:11:17
# Datalink statistics
-- Total of 1 flow:
Average throughput: 862.04 Mbit/s
95th percentile per-packet one-way delay: 109.004 ms
Loss rate: 0.39%
-- Flow 1:
Average throughput: 862.04 Mbit/s
95th percentile per-packet one-way delay: 109.004 ms
Loss rate: 0.39%
Run 6: Report of FillP-Sheep — Data Link

[Graph showing throughput and delay over time]

Flow 1 ingress (mean 865.44 Mb/s)  Flow 1 egress (mean 862.04 Mb/s)

Flow 1 (95th percentile 109.00 ms)
Run 7: Statistics of FillP-Sheep

Start at: 2018-07-26 14:32:14
End at: 2018-07-26 14:32:44
Local clock offset: 0.185 ms
Remote clock offset: -0.096 ms

# Below is generated by plot.py at 2018-07-26 17:25:06
# Datalink statistics
-- Total of 1 flow:
Average throughput: 903.34 Mbit/s
95th percentile per-packet one-way delay: 94.161 ms
Loss rate: 0.09%
-- Flow 1:
Average throughput: 903.34 Mbit/s
95th percentile per-packet one-way delay: 94.161 ms
Loss rate: 0.09%
Run 7: Report of FillP-Sheep — Data Link

![Graph showing throughput and delay over time]

- **Throughput (Mbps):**
  - Flow 1 ingress (mean 904.21 Mbps)
  - Flow 1 egress (mean 903.34 Mbps)

- **Delay:**
  - Flow 1 (95th percentile 94.16 ms)
Run 8: Statistics of FillP-Sheep

Start at: 2018-07-26 14:54:26  
End at: 2018-07-26 14:54:56  
Local clock offset: 0.192 ms  
Remote clock offset: -0.042 ms

# Below is generated by plot.py at 2018-07-26 17:25:06  
# Datalink statistics  
-- Total of 1 flow:  
Average throughput: 831.90 Mbit/s  
95th percentile per-packet one-way delay: 103.814 ms  
Loss rate: 0.14%  
-- Flow 1:  
Average throughput: 831.90 Mbit/s  
95th percentile per-packet one-way delay: 103.814 ms  
Loss rate: 0.14%
Run 8: Report of FillP-Sheep — Data Link

![Graph 1: Throughput (Mbps)](image1)

![Graph 2: Per-packet one way delay (ms)](image2)
Run 9: Statistics of FillP-Sheep

Start at: 2018-07-26 15:16:27
End at: 2018-07-26 15:16:57
Local clock offset: 0.06 ms
Remote clock offset: 1.242 ms

# Below is generated by plot.py at 2018-07-26 17:25:06
# Datalink statistics
-- Total of 1 flow:
Average throughput: 834.74 Mbit/s
95th percentile per-packet one-way delay: 99.369 ms
Loss rate: 0.10%
-- Flow 1:
Average throughput: 834.74 Mbit/s
95th percentile per-packet one-way delay: 99.369 ms
Loss rate: 0.10%
Run 9: Report of FillP-Sheep — Data Link

![Graph 1: Throughput (Mbps)]

- Flow 1 Ingress (mean 835.60 Mbps)
- Flow 1 Egress (mean 834.74 Mbps)

![Graph 2: Per-Socket One-Way Delay (ms)]

- Flow 1 (95th percentile 99.37 ms)
Run 10: Statistics of FillP-Sheep

Start at: 2018-07-26 15:37:58
End at: 2018-07-26 15:38:28
Local clock offset: 0.278 ms
Remote clock offset: -1.415 ms

# Below is generated by plot.py at 2018-07-26 17:25:07
# Datalink statistics
-- Total of 1 flow:
  Average throughput: 813.60 Mbit/s
  95th percentile per-packet one-way delay: 97.578 ms
  Loss rate: 0.11%
-- Flow 1:
  Average throughput: 813.60 Mbit/s
  95th percentile per-packet one-way delay: 97.578 ms
  Loss rate: 0.11%
Run 10: Report of FillIP-Sheep — Data Link
Run 1: Statistics of Indigo

Start at: 2018-07-26 12:35:07
End at: 2018-07-26 12:35:37
Local clock offset: -0.012 ms
Remote clock offset: 1.479 ms

# Below is generated by plot.py at 2018-07-26 17:25:07
# Datalink statistics
-- Total of 1 flow:
Average throughput: 180.62 Mbit/s
95th percentile per-packet one-way delay: 54.758 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 180.62 Mbit/s
95th percentile per-packet one-way delay: 54.758 ms
Loss rate: 0.00%
Run 1: Report of Indigo — Data Link

![Graph showing throughput and packet delay over time]

- **Throughput (Mbps)**
  - Flow 1 ingress (mean 180.64 Mbit/s)
  - Flow 1 egress (mean 180.62 Mbit/s)

- **Packet one-way delay (ms)**
  - Flow 1 (95th percentile 54.76 ms)
Run 2: Statistics of Indigo

Start at: 2018-07-26 12:56:58
End at: 2018-07-26 12:57:28
Local clock offset: +0.205 ms
Remote clock offset: +0.023 ms

# Below is generated by plot.py at 2018-07-26 17:25:07
# Datalink statistics
-- Total of 1 flow:
Average throughput: 182.38 Mbit/s
95th percentile per-packet one-way delay: 53.961 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 182.38 Mbit/s
95th percentile per-packet one-way delay: 53.961 ms
Loss rate: 0.00%
Run 2: Report of Indigo — Data Link

![Graph 1: Throughput (Mbps)](image)

- Flow 1 ingress (mean 182.40 Mbit/s)
- Flow 1 egress (mean 182.38 Mbit/s)

![Graph 2: Per-packet one-way delay (ms)](image)

- Flow 1 (95th percentile 53.96 ms)
Run 3: Statistics of Indigo

End at: 2018-07-26 13:19:44
Local clock offset: -0.12 ms
Remote clock offset: 0.153 ms

# Below is generated by plot.py at 2018-07-26 17:25:07
# Datalink statistics
-- Total of 1 flow:
Average throughput: 223.04 Mbit/s
95th percentile per-packet one-way delay: 53.844 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 223.04 Mbit/s
95th percentile per-packet one-way delay: 53.844 ms
Loss rate: 0.00%
Run 3: Report of Indigo — Data Link

Graph 1: Throughput (Mbps) vs. Time (s)
- Flow 1 ingress (mean 223.02 Mbps)
- Flow 1 egress (mean 223.04 Mbps)

Graph 2: Per-packet end-to-end delay (ms) vs. Time (s)
- Flow 1 (95th percentile 53.84 ms)
Run 4: Statistics of Indigo

Start at: 2018-07-26 13:41:16
End at: 2018-07-26 13:41:46
Local clock offset: 0.15 ms
Remote clock offset: -0.27 ms

# Below is generated by plot.py at 2018-07-26 17:25:07
# Datalink statistics
-- Total of 1 flow:
Average throughput: 208.05 Mbit/s
95th percentile per-packet one-way delay: 53.254 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 208.05 Mbit/s
95th percentile per-packet one-way delay: 53.254 ms
Loss rate: 0.00%
Run 4: Report of Indigo — Data Link

![Graph 1: Throughput (Mbps)](image1)

- Flow 1 ingress (mean 208.06 Mbit/s)
- Flow 1 egress (mean 208.05 Mbit/s)

![Graph 2: Packet one-way delay (ms)](image2)

- Flow 1 (95th percentile 53.25 ms)
Run 5: Statistics of Indigo

Start at: 2018-07-26 14:02:43
End at: 2018-07-26 14:03:13
Local clock offset: 0.063 ms
Remote clock offset: 0.039 ms

# Below is generated by plot.py at 2018-07-26 17:25:07
# Datalink statistics
-- Total of 1 flow:
  Average throughput: 211.14 Mbit/s
  95th percentile per-packet one-way delay: 53.734 ms
  Loss rate: 0.00%
-- Flow 1:
  Average throughput: 211.14 Mbit/s
  95th percentile per-packet one-way delay: 53.734 ms
  Loss rate: 0.00%
Run 5: Report of Indigo — Data Link
Run 6: Statistics of Indigo

Start at: 2018-07-26 14:24:28
End at: 2018-07-26 14:24:58
Local clock offset: 0.122 ms
Remote clock offset: -0.009 ms

# Below is generated by plot.py at 2018-07-26 17:25:07
# Datalink statistics
  -- Total of 1 flow:
  Average throughput: 213.46 Mbit/s
  95th percentile per-packet one-way delay: 53.204 ms
  Loss rate: 0.00%
  -- Flow 1:
  Average throughput: 213.46 Mbit/s
  95th percentile per-packet one-way delay: 53.204 ms
  Loss rate: 0.00%
Run 6: Report of Indigo — Data Link

![Graph showing throughput (Mbps) over time for Flow 1 ingress and egress with mean values of 213.47 Mbps and 213.46 Mbps respectively.

![Graph showing packet delay (ms) over time for Flow 1 with 95th percentile of 53.20 ms.](image_url)
Run 7: Statistics of Indigo

Start at: 2018-07-26 14:46:25
End at: 2018-07-26 14:46:55
Local clock offset: -0.179 ms
Remote clock offset: -0.301 ms

# Below is generated by plot.py at 2018-07-26 17:25:07
# Datalink statistics
-- Total of 1 flow:
Average throughput: 218.29 Mbit/s
95th percentile per-packet one-way delay: 53.168 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 218.29 Mbit/s
95th percentile per-packet one-way delay: 53.168 ms
Loss rate: 0.00%
Run 7: Report of Indigo — Data Link
Run 8: Statistics of Indigo

Start at: 2018-07-26 15:08:39
End at: 2018-07-26 15:09:09
Local clock offset: -0.014 ms
Remote clock offset: -1.36 ms

# Below is generated by plot.py at 2018-07-26 17:25:07
# Datalink statistics
-- Total of 1 flow:
Average throughput: 214.61 Mbit/s
95th percentile per-packet one-way delay: 51.964 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 214.61 Mbit/s
95th percentile per-packet one-way delay: 51.964 ms
Loss rate: 0.00%
Run 8: Report of Indigo — Data Link

[Graphs showing throughput and packet delay over time]
Run 9: Statistics of Indigo

Start at: 2018-07-26 15:30:16
End at: 2018-07-26 15:30:46
Local clock offset: 0.122 ms
Remote clock offset: -0.05 ms

# Below is generated by plot.py at 2018-07-26 17:25:07
# Datalink statistics
-- Total of 1 flow:
Average throughput: 215.89 Mbit/s
95th percentile per-packet one-way delay: 53.199 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 215.89 Mbit/s
95th percentile per-packet one-way delay: 53.199 ms
Loss rate: 0.00%
Run 9: Report of Indigo — Data Link

![Graph of throughput and packet delay over time]

- Flow 1 ingress (mean 215.91 Mbit/s)
- Flow 1 egress (mean 215.89 Mbit/s)

Flow 1 (95th percentile 53.20 ms)
Run 10: Statistics of Indigo

Start at: 2018-07-26 15:52:05  
End at: 2018-07-26 15:52:35  
Local clock offset: -0.093 ms  
Remote clock offset: -0.152 ms

# Below is generated by plot.py at 2018-07-26 17:25:07  
# Datalink statistics  
-- Total of 1 flow:  
Average throughput: 222.44 Mbit/s  
95th percentile per-packet one-way delay: 53.690 ms  
Loss rate: 0.00%  
-- Flow 1:  
Average throughput: 222.44 Mbit/s  
95th percentile per-packet one-way delay: 53.690 ms  
Loss rate: 0.00%
Run 10: Report of Indigo — Data Link

![Graph 1: Throughput (Mbps)]

*Flow 1 ingress (mean 222.43 Mbit/s)  Flow 1 egress (mean 222.44 Mbit/s)*

![Graph 2: Packet one-way delay (ms)]

*Flow 1 (95th percentile 53.69 ms)*
Run 1: Statistics of LEDBAT

End at: 2018-07-26 12:23:06
Local clock offset: 0.104 ms
Remote clock offset: 0.166 ms

# Below is generated by plot.py at 2018-07-26 17:25:07
# Datalink statistics
-- Total of 1 flow:
Average throughput: 29.23 Mbit/s
95th percentile per-packet one-way delay: 54.141 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 29.23 Mbit/s
95th percentile per-packet one-way delay: 54.141 ms
Loss rate: 0.00%
Run 1: Report of LEDBAT — Data Link

![Graph 1: Throughput vs Time (Mbps/s)]

- **Flow 1 ingress (mean 29.23 Mbps/s)**
- **Flow 1 egress (mean 29.23 Mbps/s)**

![Graph 2: Per-packet round-trip delay (ms)]

- **Flow 1 (95th percentile 54.14 ms)**
Run 2: Statistics of LEDBAT

Start at: 2018-07-26 12:44:19
End at: 2018-07-26 12:44:49
Local clock offset: -0.083 ms
Remote clock offset: 0.068 ms

# Below is generated by plot.py at 2018-07-26 17:25:07
# Datalink statistics
-- Total of 1 flow:
Average throughput: 31.28 Mbit/s
95th percentile per-packet one-way delay: 54.300 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 31.28 Mbit/s
95th percentile per-packet one-way delay: 54.300 ms
Loss rate: 0.00%
Run 2: Report of LEDBAT — Data Link

![Graph showing throughput and packet delay over time.]

- **Flow 1 ingress** (mean 31.28 Mbit/s)
- **Flow 1 egress** (mean 31.28 Mbit/s)

- **Per-packet one-way delay (ms):**
  - Flow 1 (95th percentile 54.30 ms)
Run 3: Statistics of LEDBAT

Start at: 2018-07-26 13:06:25
End at: 2018-07-26 13:06:55
Local clock offset: ~0.056 ms
Remote clock offset: 0.19 ms

# Below is generated by plot.py at 2018-07-26 17:25:07
# Datalink statistics
-- Total of 1 flow:
Average throughput: 32.93 Mbit/s
95th percentile per-packet one-way delay: 54.843 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 32.93 Mbit/s
95th percentile per-packet one-way delay: 54.843 ms
Loss rate: 0.00%
Run 3: Report of LEDBAT — Data Link

![Graphs showing throughput and per-packet round-trip delay analysis.]

- **Throughput (Mbps):**
  - Flow 1 ingress (mean 32.92 Mbps)
  - Flow 1 egress (mean 32.93 Mbps)

- **Per-packet round-trip delay (ms):**
  - Flow 1 (95th percentile 54.84 ms)
Run 4: Statistics of LEDBAT

Local clock offset: -0.056 ms
Remote clock offset: -0.059 ms

# Below is generated by plot.py at 2018-07-26 17:25:07
# Datalink statistics
-- Total of 1 flow:
Average throughput: 30.26 Mbit/s
95th percentile per-packet one-way delay: 54.939 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 30.26 Mbit/s
95th percentile per-packet one-way delay: 54.939 ms
Loss rate: 0.00%
Run 4: Report of LEDBAT — Data Link
Run 5: Statistics of LEDBAT

Start at: 2018-07-26 13:50:30
End at: 2018-07-26 13:51:00
Local clock offset: -0.015 ms
Remote clock offset: -0.199 ms

# Below is generated by plot.py at 2018-07-26 17:25:07
# Datalink statistics
-- Total of 1 flow:
Average throughput: 32.48 Mbit/s
95th percentile per-packet one-way delay: 54.808 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 32.48 Mbit/s
95th percentile per-packet one-way delay: 54.808 ms
Loss rate: 0.00%
Run 5: Report of LEDBAT — Data Link
Run 6: Statistics of LEDBAT

Start at: 2018-07-26 14:12:06
End at: 2018-07-26 14:12:36
Local clock offset: 0.034 ms
Remote clock offset: 0.102 ms

# Below is generated by plot.py at 2018-07-26 17:25:07
# Datalink statistics
-- Total of 1 flow:
Average throughput: 31.40 Mbit/s
95th percentile per-packet one-way delay: 53.845 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 31.40 Mbit/s
95th percentile per-packet one-way delay: 53.845 ms
Loss rate: 0.00%
Run 6: Report of LEDBAT — Data Link

![Graph of throughput over time]

- **Flow 1 ingress** (mean 31.41 Mbit/s)
- **Flow 1 egress** (mean 31.40 Mbit/s)

![Graph of per-packet one-way delay over time]

- **Flow 1** (95th percentile 53.84 ms)
Run 7: Statistics of LEDBAT

Start at: 2018-07-26 14:33:54
End at: 2018-07-26 14:34:24
Local clock offset: 0.017 ms
Remote clock offset: 0.091 ms

# Below is generated by plot.py at 2018-07-26 17:25:07
# Datalink statistics
-- Total of 1 flow:
Average throughput: 34.84 Mbit/s
95th percentile per-packet one-way delay: 52.139 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 34.84 Mbit/s
95th percentile per-packet one-way delay: 52.139 ms
Loss rate: 0.00%
Run 7: Report of LEDBAT — Data Link
Run 8: Statistics of LEDBAT

Start at: 2018-07-26 14:56:04
End at: 2018-07-26 14:56:34
Local clock offset: 0.125 ms
Remote clock offset: -1.282 ms

# Below is generated by plot.py at 2018-07-26 17:25:07
# Datalink statistics
-- Total of 1 flow:
Average throughput: 31.84 Mbit/s
95th percentile per-packet one-way delay: 52.781 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 31.84 Mbit/s
95th percentile per-packet one-way delay: 52.781 ms
Loss rate: 0.00%
Run 8: Report of LEDBAT — Data Link

![Throughput Graph]

- Flow 1 ingress (mean 31.84 Mbit/s)
- Flow 1 egress (mean 31.84 Mbit/s)

![Packet Delay Graph]

- Flow 1 (95th percentile 52.78 ms)
Run 9: Statistics of LEDBAT

Start at: 2018-07-26 15:18:04
End at: 2018-07-26 15:18:34
Local clock offset: 0.048 ms
Remote clock offset: 1.189 ms

# Below is generated by plot.py at 2018-07-26 17:25:07
# Datalink statistics
-- Total of 1 flow:
Average throughput: 33.85 Mbit/s
95th percentile per-packet one-way delay: 54.659 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 33.85 Mbit/s
95th percentile per-packet one-way delay: 54.659 ms
Loss rate: 0.00%
Run 9: Report of LEDBAT — Data Link

![Graph 1: Throughput vs Time](image1)

- Flow 1 ingress (mean 33.85 Mbit/s)
- Flow 1 egress (mean 33.85 Mbit/s)

![Graph 2: Per-packet one-way delay](image2)

- Flow 1 (95th percentile 54.66 ms)
Run 10: Statistics of LEDBAT

Start at: 2018-07-26 15:39:34
End at: 2018-07-26 15:40:04
Local clock offset: 0.023 ms
Remote clock offset: -1.235 ms

# Below is generated by plot.py at 2018-07-26 17:25:07
# Datalink statistics
-- Total of 1 flow:
  Average throughput: 33.55 Mbit/s
  95th percentile per-packet one-way delay: 50.720 ms
  Loss rate: 0.00%
-- Flow 1:
  Average throughput: 33.55 Mbit/s
  95th percentile per-packet one-way delay: 50.720 ms
  Loss rate: 0.00%
Run 10: Report of LEDBAT — Data Link

![Graph 1: Throughput (Mbps) vs Time (s)]

- **Flow 1 ingress (mean 33.54 Mbps)**
- **Flow 1 egress (mean 33.55 Mbps)**

![Graph 2: Per packet one-way delay (ms) vs Time (s)]

- **Flow 1 (95th percentile 50.72 ms)**
Run 1: Statistics of PCC-Allegro

Start at: 2018-07-26 12:24:50
End at: 2018-07-26 12:25:20
Local clock offset: -0.309 ms
Remote clock offset: 0.182 ms

# Below is generated by plot.py at 2018-07-26 17:30:49
# Datalink statistics
-- Total of 1 flow:
Average throughput: 526.07 Mbit/s
95th percentile per-packet one-way delay: 187.718 ms
Loss rate: 0.62%
-- Flow 1:
Average throughput: 526.07 Mbit/s
95th percentile per-packet one-way delay: 187.718 ms
Loss rate: 0.62%
Run 1: Report of PCC-Allegro — Data Link
Run 2: Statistics of PCC-Allegro

Start at: 2018-07-26 12:46:33
End at: 2018-07-26 12:47:03
Local clock offset: -0.126 ms
Remote clock offset: -0.307 ms

# Below is generated by plot.py at 2018-07-26 17:31:02
# Datalink statistics
-- Total of 1 flow:
Average throughput: 517.74 Mbit/s
95th percentile per-packet one-way delay: 129.905 ms
Loss rate: 0.32%
-- Flow 1:
Average throughput: 517.74 Mbit/s
95th percentile per-packet one-way delay: 129.905 ms
Loss rate: 0.32%
Run 2: Report of PCC-Allegro — Data Link
Run 3: Statistics of PCC-Allegro

Start at: 2018-07-26 13:08:40
End at: 2018-07-26 13:09:10
Local clock offset: -0.283 ms
Remote clock offset: 0.189 ms

# Below is generated by plot.py at 2018-07-26 17:31:02
# Datalink statistics
-- Total of 1 flow:
Average throughput: 514.90 Mbit/s
95th percentile per-packet one-way delay: 185.342 ms
Loss rate: 0.78%
-- Flow 1:
Average throughput: 514.90 Mbit/s
95th percentile per-packet one-way delay: 185.342 ms
Loss rate: 0.78%
Run 3: Report of PCC-Allegro — Data Link
Run 4: Statistics of PCC-Allegro

Start at: 2018-07-26 13:30:39
End at: 2018-07-26 13:31:09
Local clock offset: -0.185 ms
Remote clock offset: -0.192 ms

# Below is generated by plot.py at 2018-07-26 17:33:38
# Datalink statistics
-- Total of 1 flow:
Average throughput: 545.71 Mbit/s
95th percentile per-packet one-way delay: 101.037 ms
Loss rate: 0.33%
-- Flow 1:
Average throughput: 545.71 Mbit/s
95th percentile per-packet one-way delay: 101.037 ms
Loss rate: 0.33%
Run 4: Report of PCC-Allegro — Data Link

![Graph 1: Throughput](image1)

- Flow 1 ingress (mean 547.44 Mbit/s)
- Flow 1 egress (mean 545.71 Mbit/s)

![Graph 2: Packet Delay](image2)

- Flow 1 (95th percentile 101.04 ms)
Run 5: Statistics of PCC-Allegro

Local clock offset: 0.005 ms
Remote clock offset: 1.154 ms

# Below is generated by plot.py at 2018-07-26 17:35:34
# Datalink statistics
-- Total of 1 flow:
Average throughput: 528.94 Mbit/s
95th percentile per-packet one-way delay: 85.205 ms
Loss rate: 0.24%
-- Flow 1:
Average throughput: 528.94 Mbit/s
95th percentile per-packet one-way delay: 85.205 ms
Loss rate: 0.24%
Run 5: Report of PCC-Allegro — Data Link

![Graph showing throughput and delay over time for Flow 1.]

Throughput (Mbps)

Time (s)

Flow 1 ingress (mean 530.23 Mbit/s)  Flow 1 egress (mean 528.94 Mbit/s)

Per packet one way delay (ms)

Time (s)

Flow 1 (95th percentile 85.20 ms)
Run 6: Statistics of PCC-Allegro

Start at: 2018-07-26 14:14:20
End at: 2018-07-26 14:14:50
Local clock offset: 0.026 ms
Remote clock offset: 0.114 ms

# Below is generated by plot.py at 2018-07-26 17:36:03
# Datalink statistics
-- Total of 1 flow:
Average throughput: 545.53 Mbit/s
95th percentile per-packet one-way delay: 181.844 ms
Loss rate: 1.39%
-- Flow 1:
Average throughput: 545.53 Mbit/s
95th percentile per-packet one-way delay: 181.844 ms
Loss rate: 1.39%
Run 6: Report of PCC-Allegro — Data Link

![Graph of throughput and per-packet delay over time for Flow 1 ingress and egress.]
Run 7: Statistics of PCC-Allegro

Start at: 2018-07-26 14:36:09
End at: 2018-07-26 14:36:39
Local clock offset: 0.017 ms
Remote clock offset: 1.455 ms

# Below is generated by plot.py at 2018-07-26 17:36:32
# Datalink statistics
-- Total of 1 flow:
Average throughput: 531.15 Mbit/s
95th percentile per-packet one-way delay: 82.447 ms
Loss rate: 0.28%
-- Flow 1:
Average throughput: 531.15 Mbit/s
95th percentile per-packet one-way delay: 82.447 ms
Loss rate: 0.28%
Run 7: Report of PCC-Allegro — Data Link

![Throughput Graph](image1)

![Delay Graph](image2)
Run 8: Statistics of PCC-Allegro

Start at: 2018-07-26 14:58:18
End at: 2018-07-26 14:58:48
Local clock offset: -0.171 ms
Remote clock offset: -1.363 ms

# Below is generated by plot.py at 2018-07-26 17:37:23
# Datalink statistics
-- Total of 1 flow:
Average throughput: 560.49 Mbit/s
95th percentile per-packet one-way delay: 151.773 ms
Loss rate: 0.76%
-- Flow 1:
Average throughput: 560.49 Mbit/s
95th percentile per-packet one-way delay: 151.773 ms
Loss rate: 0.76%
Run 8: Report of PCC-Allegro — Data Link

![Throughput Graph](image1)

Flow 1 ingress (mean 564.76 Mbit/s)  
Flow 1 egress (mean 560.49 Mbit/s)

![Delay Graph](image2)

Flow 1 (95th percentile 151.77 ms)
Run 9: Statistics of PCC-Allegro

Start at: 2018-07-26 15:20:18
End at: 2018-07-26 15:20:48
Local clock offset: 0.025 ms
Remote clock offset: 0.164 ms

# Below is generated by plot.py at 2018-07-26 17:42:20
# Datalink statistics
-- Total of 1 flow:
Average throughput: 532.33 Mbit/s
95th percentile per-packet one-way delay: 188.937 ms
Loss rate: 1.99%
-- Flow 1:
Average throughput: 532.33 Mbit/s
95th percentile per-packet one-way delay: 188.937 ms
Loss rate: 1.99%
Run 9: Report of PCC-Allegro — Data Link

![Chart 1: Throughput vs Time (Mbps)]

![Chart 2: Per-Packet One-Way Delay (ms)]

Flow 1 ingress (mean 543.21 Mbit/s)  
Flow 1 egress (mean 532.33 Mbit/s)

Flow 1 (95th percentile 188.94 ms)

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Run 10: Statistics of PCC-Allegro

End at: 2018-07-26 15:42:18
Local clock offset: 0.009 ms
Remote clock offset: -0.207 ms

# Below is generated by plot.py at 2018-07-26 17:42:41
# Datalink statistics
-- Total of 1 flow:
Average throughput: 540.60 Mbit/s
95th percentile per-packet one-way delay: 176.205 ms
Loss rate: 0.90%
-- Flow 1:
Average throughput: 540.60 Mbit/s
95th percentile per-packet one-way delay: 176.205 ms
Loss rate: 0.90%
Run 1: Statistics of PCC-Expr

Start at: 2018-07-26 12:26:13
End at: 2018-07-26 12:26:43
Local clock offset: -0.144 ms
Remote clock offset: 0.035 ms

# Below is generated by plot.py at 2018-07-26 17:42:41
# Datalink statistics
-- Total of 1 flow:
Average throughput: 273.96 Mbit/s
95th percentile per-packet one-way delay: 173.741 ms
Loss rate: 4.39%
-- Flow 1:
Average throughput: 273.96 Mbit/s
95th percentile per-packet one-way delay: 173.741 ms
Loss rate: 4.39%
Run 1: Report of PCC-Expr — Data Link

![Graph showing throughput and packet delay over time.]

- Flow 1 ingress (mean 286.54 Mbit/s)
- Flow 1 egress (mean 273.96 Mbit/s)

Flow 1 (95th percentile 173.74 ms)
Run 2: Statistics of PCC-Expr

Start at: 2018-07-26 12:47:56
End at: 2018-07-26 12:48:26
Local clock offset: 0.177 ms
Remote clock offset: 1.45 ms

# Below is generated by plot.py at 2018-07-26 17:51:40
# Datalink statistics
-- Total of 1 flow:
Average throughput: 449.79 Mbit/s
95th percentile per-packet one-way delay: 191.812 ms
Loss rate: 6.10%
-- Flow 1:
Average throughput: 449.79 Mbit/s
95th percentile per-packet one-way delay: 191.812 ms
Loss rate: 6.10%
Run 2: Report of PCC-Expr — Data Link

Throughput (Mbps)

Time (s)

Flow 1 ingress (mean 479.00 Mbit/s)  Flow 1 egress (mean 449.79 Mbit/s)

Per packet one way delay (ms)

Time (s)

Flow 1 (95th percentile 191.81 ms)
Run 3: Statistics of PCC-Expr

Start at: 2018-07-26 13:10:03
End at: 2018-07-26 13:10:33
Local clock offset: 0.192 ms
Remote clock offset: -0.119 ms

# Below is generated by plot.py at 2018-07-26 17:51:40
# Datalink statistics
-- Total of 1 flow:
Average throughput: 332.31 Mbit/s
95th percentile per-packet one-way delay: 170.871 ms
Loss rate: 2.15%
-- Flow 1:
Average throughput: 332.31 Mbit/s
95th percentile per-packet one-way delay: 170.871 ms
Loss rate: 2.15%
Run 3: Report of PCC-Expr — Data Link
Run 4: Statistics of PCC-Expr

Start at: 2018-07-26 13:32:02
End at: 2018-07-26 13:32:32
Local clock offset: -0.078 ms
Remote clock offset: -0.037 ms

# Below is generated by plot.py at 2018-07-26 17:51:40
# Datalink statistics
-- Total of 1 flow:
Average throughput: 341.06 Mbit/s
95th percentile per-packet one-way delay: 67.628 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 341.06 Mbit/s
95th percentile per-packet one-way delay: 67.628 ms
Loss rate: 0.00%
Run 4: Report of PCC-Expr – Data Link
Run 5: Statistics of PCC-Expr

Start at: 2018-07-26 13:54:08
End at: 2018-07-26 13:54:38
Local clock offset: 0.153 ms
Remote clock offset: -0.087 ms

# Below is generated by plot.py at 2018-07-26 17:51:41
# Datalink statistics
-- Total of 1 flow:
  Average throughput: 114.52 Mbit/s
  95th percentile per-packet one-way delay: 53.503 ms
  Loss rate: 0.00%
-- Flow 1:
  Average throughput: 114.52 Mbit/s
  95th percentile per-packet one-way delay: 53.503 ms
  Loss rate: 0.00%
Run 5: Report of PCC-Expr — Data Link

![Graph 1](Image 1)

- Flow 1 ingress (mean 114.53 Mbit/s)
- Flow 1 egress (mean 114.52 Mbit/s)

![Graph 2](Image 2)

- Flow 1 (99th percentile 53.30 ms)
Run 6: Statistics of PCC-Expr

Start at: 2018-07-26 14:15:44
End at: 2018-07-26 14:16:14
Local clock offset: 0.084 ms
Remote clock offset: -0.338 ms

# Below is generated by plot.py at 2018-07-26 17:51:41
# Datalink statistics
-- Total of 1 flow:
  Average throughput: 111.93 Mbit/s
  95th percentile per-packet one-way delay: 53.300 ms
  Loss rate: 0.00%
-- Flow 1:
  Average throughput: 111.93 Mbit/s
  95th percentile per-packet one-way delay: 53.300 ms
  Loss rate: 0.00%
Run 6: Report of PCC-Expr — Data Link

![Graphs showing throughput and packet error rate over time.](image-url)
Run 7: Statistics of PCC-Expr

Start at: 2018-07-26 14:37:32
End at: 2018-07-26 14:38:02
Local clock offset: 0.187 ms
Remote clock offset: 0.191 ms

# Below is generated by plot.py at 2018-07-26 17:51:41
# Datalink statistics
-- Total of 1 flow:
Average throughput: 225.88 Mbit/s
95th percentile per-packet one-way delay: 58.575 ms
Loss rate: 0.14%
-- Flow 1:
Average throughput: 225.88 Mbit/s
95th percentile per-packet one-way delay: 58.575 ms
Loss rate: 0.14%
Run 7: Report of PCC-Expr — Data Link
Run 8: Statistics of PCC-Expr

Start at: 2018-07-26 14:59:42
End at: 2018-07-26 15:00:12
Local clock offset: 0.102 ms
Remote clock offset: 0.024 ms

# Below is generated by plot.py at 2018-07-26 17:57:07
# Datalink statistics
-- Total of 1 flow:
Average throughput: 341.25 Mbit/s
95th percentile per-packet one-way delay: 60.928 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 341.25 Mbit/s
95th percentile per-packet one-way delay: 60.928 ms
Loss rate: 0.00%
Run 8: Report of PCC-Expr — Data Link

![Graphs showing throughput and delay](image_url)
Run 9: Statistics of PCC-Expr

End at: 2018-07-26 15:22:11
Local clock offset: ~0.079 ms
Remote clock offset: 1.255 ms

# Below is generated by plot.py at 2018-07-26 17:57:07
# Datalink statistics
-- Total of 1 flow:
Average throughput: 127.69 Mbit/s
95th percentile per-packet one-way delay: 54.627 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 127.69 Mbit/s
95th percentile per-packet one-way delay: 54.627 ms
Loss rate: 0.00%
Run 9: Report of PCC-Expr — Data Link
Run 10: Statistics of PCC-Expr

Start at: 2018-07-26 15:43:12
End at: 2018-07-26 15:43:42
Local clock offset: 0.038 ms
Remote clock offset: -0.151 ms

# Below is generated by plot.py at 2018-07-26 17:57:18
# Datalink statistics
-- Total of 1 flow:
  Average throughput: 341.62 Mbit/s
  95th percentile per-packet one-way delay: 109.273 ms
  Loss rate: 0.00%
-- Flow 1:
  Average throughput: 341.62 Mbit/s
  95th percentile per-packet one-way delay: 109.273 ms
  Loss rate: 0.00%
Run 10: Report of PCC-Expr — Data Link

![Throughput and Packet Delay Graphs]

- Flow 1 ingress (mean 341.59 Mbit/s)
- Flow 1 egress (mean 341.62 Mbit/s)

Flow 1 (95th percentile 109.27 ms)
Run 1: Statistics of QUIC Cubic

Start at: 2018-07-26 12:29:59
End at: 2018-07-26 12:30:29
Local clock offset: 0.243 ms
Remote clock offset: 0.106 ms
Run 1: Report of QUIC Cubic — Data Link

![Graph showing throughput over time for flow 1 ingress and flow 1 egress with mean 0.06 Mbps and 0.06 Mbps respectively.]

![Graph showing percentile one-way delay for flow 1 with 95th percentile 53.05 ms.]
Run 2: Statistics of QUIC Cubic

Start at: 2018-07-26 12:51:50
End at: 2018-07-26 12:52:20
Local clock offset: -0.087 ms
Remote clock offset: -0.304 ms

# Below is generated by plot.py at 2018-07-26 17:57:18
# Datalink statistics
-- Total of 1 flow:
Average throughput: 76.16 Mbit/s
95th percentile per-packet one-way delay: 53.015 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 76.16 Mbit/s
95th percentile per-packet one-way delay: 53.015 ms
Loss rate: 0.00%
Run 2: Report of QUIC Cubic — Data Link
Run 3: Statistics of QUIC Cubic

Local clock offset: -0.01 ms
Remote clock offset: 1.164 ms
Run 3: Report of QUIC Cubic — Data Link

![Graph 1: Throughput vs Time](image1)

- Blue line: Flow 1 ingress (mean 0.06 Mbit/s)
- Red line: Flow 1 egress (mean 0.06 Mbit/s)

![Graph 2: Percentile vs Time](image2)

- Blue dot: Flow 1 (95th percentile 51.48 ms)
Run 4: Statistics of QUIC Cubic

Start at: 2018-07-26 13:35:58
End at: 2018-07-26 13:36:28
Local clock offset: -0.043 ms
Remote clock offset: 0.124 ms
Run 4: Report of QUIC Cubic — Data Link

![Graph 1: Throughput (Mbps) vs Time (s)]

- Flow 1 ingress (mean 0.06 Mbps)
- Flow 1 egress (mean 0.06 Mbps)

![Graph 2: Per-packet one-way delay (ms) vs Time (s)]

- Flow 1 (95th percentile 53.85 ms)
Run 5: Statistics of QUIC Cubic

Start at: 2018-07-26 13:57:42
End at: 2018-07-26 13:58:12
Local clock offset: -0.054 ms
Remote clock offset: -0.108 ms
Run 5: Report of QUIC Cubic — Data Link

![Graph showing throughput over time for Flow 1 ingress and egress.
Flow 1 ingress (mean 0.06 Mbits/s) and Flow 1 egress (mean 0.06 Mbits/s).

![Graph showing per-packet one-way delay for Flow 1.
Flow 1 (95th percentile 53.67 ms).]
Run 6: Statistics of QUIC Cubic

Start at: 2018-07-26 14:19:16
End at: 2018-07-26 14:19:46
Local clock offset: 0.005 ms
Remote clock offset: -0.153 ms
Run 6: Report of QUIC Cubic — Data Link

![Graph of Throughput vs. Time]

- Flow 1 ingress (mean 0.06 Mbit/s)
- Flow 1 egress (mean 0.06 Mbit/s)

![Graph of Packet Error Rate vs. Time]

- Flow 1 (95th percentile 50.50 ms)
Run 7: Statistics of QUIC Cubic

Start at: 2018-07-26 14:41:10
End at: 2018-07-26 14:41:40
Local clock offset: 0.245 ms
Remote clock offset: 1.278 ms
Run 7: Report of QUIC Cubic — Data Link

![Graph 1: Throughput vs. Time](image1)

![Graph 2: Per-packet one-way delay vs. Time](image2)
Run 8: Statistics of QUIC Cubic

Start at: 2018-07-26 15:03:34
End at: 2018-07-26 15:04:04
Local clock offset: -0.112 ms
Remote clock offset: -0.029 ms

# Below is generated by plot.py at 2018-07-26 17:57:18
# Datalink statistics
-- Total of 1 flow:
Average throughput: 79.83 Mbit/s
95th percentile per-packet one-way delay: 50.356 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 79.83 Mbit/s
95th percentile per-packet one-way delay: 50.356 ms
Loss rate: 0.00%
Run 9: Statistics of QUIC Cubic

Start at: 2018-07-26 15:25:19
End at: 2018-07-26 15:25:49
Local clock offset: 0.028 ms
Remote clock offset: -0.047 ms
Run 9: Report of QUIC Cubic — Data Link
Run 10: Statistics of QUIC Cubic

Start at: 2018-07-26 15:47:06
End at: 2018-07-26 15:47:36
Local clock offset: 0.075 ms
Remote clock offset: 0.038 ms
Run 10: Report of QUIC Cubic — Data Link

![Graphs showing throughput and one-way delay over time.]
Run 1: Statistics of SCReAM

End at: 2018-07-26 12:29:23
Local clock offset: -0.107 ms
Remote clock offset: 0.021 ms

# Below is generated by plot.py at 2018-07-26 17:57:18
# Datalink statistics
-- Total of 1 flow:
Average throughput: 0.21 Mbit/s
95th percentile per-packet one-way delay: 53.585 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 0.21 Mbit/s
95th percentile per-packet one-way delay: 53.585 ms
Loss rate: 0.00%
Run 1: Report of SCReAM — Data Link
Run 2: Statistics of SCReAM

Start at: 2018-07-26 12:50:44
End at: 2018-07-26 12:51:14
Local clock offset: -0.08 ms
Remote clock offset: 1.247 ms

# Below is generated by plot.py at 2018-07-26 17:57:18
# Datalink statistics
-- Total of 1 flow:
Average throughput: 0.21 Mbit/s
95th percentile per-packet one-way delay: 60.173 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 0.21 Mbit/s
95th percentile per-packet one-way delay: 60.173 ms
Loss rate: 0.00%
Run 2: Report of SCReAM — Data Link

![Graph 1: Throughput vs. Time](image)

- Flow 1 ingress (mean 0.21 Mbit/s)
- Flow 1 egress (mean 0.21 Mbit/s)

![Graph 2: Per-packet one-way delay vs. Time](image)

- Flow 1 (95th percentile 60.17 ms)
Run 3: Statistics of SCReAM

Start at: 2018-07-26 13:12:53
Local clock offset: 0.061 ms
Remote clock offset: 0.218 ms

# Below is generated by plot.py at 2018-07-26 17:57:18
# Datalink statistics
-- Total of 1 flow:
Average throughput: 0.22 Mbit/s
95th percentile per-packet one-way delay: 53.926 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 0.22 Mbit/s
95th percentile per-packet one-way delay: 53.926 ms
Loss rate: 0.00%
Run 3: Report of SCReAM — Data Link

![Graph showing throughput and latency over time for different flow types]
Run 4: Statistics of SCReAM

Start at: 2018-07-26 13:34:52
End at: 2018-07-26 13:35:22
Local clock offset: -0.017 ms
Remote clock offset: 0.114 ms

# Below is generated by plot.py at 2018-07-26 17:57:18
# Datalink statistics
-- Total of 1 flow:
  Average throughput: 0.21 Mbit/s
  95th percentile per-packet one-way delay: 53.899 ms
  Loss rate: 0.00%
-- Flow 1:
  Average throughput: 0.21 Mbit/s
  95th percentile per-packet one-way delay: 53.899 ms
  Loss rate: 0.00%
Run 4: Report of SCReAM — Data Link

![Graph of throughput over time](image1)

![Graph of packet one-way delay over time](image2)
Run 5: Statistics of SCReAM

Start at: 2018-07-26 13:56:36
End at: 2018-07-26 13:57:06
Local clock offset: 0.17 ms
Remote clock offset: -0.021 ms

# Below is generated by plot.py at 2018-07-26 17:57:18
# Datalink statistics
-- Total of 1 flow:
Average throughput: 0.21 Mbit/s
95th percentile per-packet one-way delay: 50.608 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 0.21 Mbit/s
95th percentile per-packet one-way delay: 50.608 ms
Loss rate: 0.00%
Run 5: Report of SCReAM — Data Link

![Graph showing throughput and packet delay over time]

- **Throughput (kb/s)**
  - **Flow 1 ingress (mean 0.21 Mbit/s)**
  - **Flow 1 egress (mean 0.21 Mbit/s)**

- **Packet delay (ms)**
  - Flow 1 (95th percentile 50.61 ms)
Run 6: Statistics of SCReAM

Start at: 2018-07-26 14:18:10
End at: 2018-07-26 14:18:40
Local clock offset: 0.04 ms
Remote clock offset: 0.005 ms

# Below is generated by plot.py at 2018-07-26 17:57:18
# Datalink statistics
-- Total of 1 flow:
Average throughput: 0.21 Mbit/s
95th percentile per-packet one-way delay: 53.881 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 0.21 Mbit/s
95th percentile per-packet one-way delay: 53.881 ms
Loss rate: 0.00%
Run 6: Report of SCReAM — Data Link
Run 7: Statistics of SCReAM

Start at: 2018-07-26 14:40:04
End at: 2018-07-26 14:40:34
Local clock offset: -0.001 ms
Remote clock offset: -0.069 ms

# Below is generated by plot.py at 2018-07-26 17:57:18
# Datalink statistics
-- Total of 1 flow:
Average throughput: 0.21 Mbit/s
95th percentile per-packet one-way delay: 53.795 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 0.21 Mbit/s
95th percentile per-packet one-way delay: 53.795 ms
Loss rate: 0.00%
Run 7: Report of SCReAM — Data Link

![Graph of Throughput (Mbps)](image1)

- Flow 1 ingress (mean 0.21 Mbps)
- Flow 1 egress (mean 0.21 Mbps)

![Graph of Per-packet one-way delay (ms)](image2)

- Flow 1 (95th percentile 53.80 ms)
Run 8: Statistics of SCReAM

Start at: 2018-07-26 15:02:28
End at: 2018-07-26 15:02:59
Local clock offset: -0.071 ms
Remote clock offset: 0.051 ms

# Below is generated by plot.py at 2018-07-26 17:57:18
# Datalink statistics
-- Total of 1 flow:
Average throughput: 0.21 Mbit/s
95th percentile per-packet one-way delay: 53.546 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 0.21 Mbit/s
95th percentile per-packet one-way delay: 53.546 ms
Loss rate: 0.00%
Run 8: Report of SCReAM — Data Link

![Graph showing throughput over time with two overlaying lines indicating flow ingress and egress.]

![Graph showing per-packet one-way delay with data points indicating flow 1 with a 95th percentile at 53.55 ms.]
Run 9: Statistics of SCReAM

End at: 2018-07-26 15:24:44
Local clock offset: 0.146 ms
Remote clock offset: -1.429 ms

# Below is generated by plot.py at 2018-07-26 17:57:18
# Datalink statistics
-- Total of 1 flow:
Average throughput: 0.21 Mbit/s
95th percentile per-packet one-way delay: 48.924 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 0.21 Mbit/s
95th percentile per-packet one-way delay: 48.924 ms
Loss rate: 0.00%
Run 9: Report of SCReAM — Data Link

![Graph of throughput over time with two lines: one for Flow 1 ingress (mean 0.21 Mbit/s) and one for Flow 1 egress (mean 0.21 Mbit/s).]

![Graph of packet delay over time with data points and a line for Flow 1 (95th percentile 48.92 ms).]
Run 10: Statistics of SCReAM

Start at: 2018-07-26 15:46:00
End at: 2018-07-26 15:46:30
Local clock offset: -0.033 ms
Remote clock offset: -0.143 ms

# Below is generated by plot.py at 2018-07-26 17:57:18
# Datalink statistics
-- Total of 1 flow:
Average throughput: 0.21 Mbit/s
95th percentile per-packet one-way delay: 53.450 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 0.21 Mbit/s
95th percentile per-packet one-way delay: 53.450 ms
Loss rate: 0.00%
Run 10: Report of SCReAM — Data Link

![Graph showing network data]
Run 1: Statistics of Sprout

End at: 2018-07-26 12:24:14
Local clock offset: -0.113 ms
Remote clock offset: -1.343 ms

# Below is generated by plot.py at 2018-07-26 17:57:18
# Datalink statistics
-- Total of 1 flow:
Average throughput: 6.97 Mbit/s
95th percentile per-packet one-way delay: 52.527 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 6.97 Mbit/s
95th percentile per-packet one-way delay: 52.527 ms
Loss rate: 0.00%
Run 1: Report of Sprout — Data Link

[Graph showing throughput and delay over time with annotations for Flow 1 ingress and egress rates.]

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Run 2: Statistics of Sprout

Start at: 2018-07-26 12:45:27
End at: 2018-07-26 12:45:57
Local clock offset: -0.036 ms
Remote clock offset: -0.037 ms

# Below is generated by plot.py at 2018-07-26 17:57:18
# Datalink statistics
-- Total of 1 flow:
Average throughput: 6.64 Mbit/s
95th percentile per-packet one-way delay: 53.842 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 6.64 Mbit/s
95th percentile per-packet one-way delay: 53.842 ms
Loss rate: 0.00%
Run 2: Report of Sprout — Data Link

Throughput (Mbps)

Time (s)

Flow 1 ingress (mean 6.64 Mbit/s)  Flow 1 egress (mean 6.64 Mbit/s)

Per-packet one-way delay (ms)

Time (s)

Flow 1 (95th percentile 53.04 ms)
Run 3: Statistics of Sprout

Start at: 2018-07-26 13:07:33
End at: 2018-07-26 13:08:03
Local clock offset: -0.27 ms
Remote clock offset: -0.126 ms

# Below is generated by plot.py at 2018-07-26 17:57:19
# Datalink statistics
-- Total of 1 flow:
Average throughput: 7.50 Mbit/s
95th percentile per-packet one-way delay: 54.241 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 7.50 Mbit/s
95th percentile per-packet one-way delay: 54.241 ms
Loss rate: 0.00%
Run 3: Report of Sprout — Data Link

![Graph 1: Throughput (Mbps) over time]

- **Flow 1 ingress (mean 7.50 Mbit/s)**
- **Flow 1 egress (mean 7.50 Mbit/s)**

![Graph 2: Per packet one way delay (ms) over time]

- **Flow 1 (95th percentile 54.24 ms)**
Run 4: Statistics of Sprout

End at: 2018-07-26 13:30:03
Local clock offset: -0.076 ms
Remote clock offset: 0.064 ms

# Below is generated by plot.py at 2018-07-26 17:57:19
# Datalink statistics
-- Total of 1 flow:
Average throughput: 6.89 Mbit/s
95th percentile per-packet one-way delay: 54.209 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 6.89 Mbit/s
95th percentile per-packet one-way delay: 54.209 ms
Loss rate: 0.00%
Run 4: Report of Sprout — Data Link

Graphs showing throughput and per-packet one-way delay over time.
Run 5: Statistics of Sprout

End at: 2018-07-26 13:52:08
Local clock offset: -0.019 ms
Remote clock offset: -0.059 ms

# Below is generated by plot.py at 2018-07-26 17:57:19
# Datalink statistics
-- Total of 1 flow:
Average throughput: 7.01 Mbit/s
95th percentile per-packet one-way delay: 53.956 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 7.01 Mbit/s
95th percentile per-packet one-way delay: 53.956 ms
Loss rate: 0.00%
Run 5: Report of Sprout — Data Link
Run 6: Statistics of Sprout

End at: 2018-07-26 14:13:44
Local clock offset: -0.018 ms
Remote clock offset: 0.141 ms

# Below is generated by plot.py at 2018-07-26 17:57:19
# Datalink statistics
-- Total of 1 flow:
Average throughput: 7.46 Mbit/s
95th percentile per-packet one-way delay: 54.651 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 7.46 Mbit/s
95th percentile per-packet one-way delay: 54.651 ms
Loss rate: 0.00%
Run 6: Report of Sprout — Data Link
Run 7: Statistics of Sprout

Start at: 2018-07-26 14:35:02
End at: 2018-07-26 14:35:32
Local clock offset: 0.052 ms
Remote clock offset: 0.053 ms

# Below is generated by plot.py at 2018-07-26 17:57:19
# Datalink statistics
-- Total of 1 flow:
  Average throughput: 6.92 Mbit/s
  95th percentile per-packet one-way delay: 53.982 ms
  Loss rate: 0.00%
-- Flow 1:
  Average throughput: 6.92 Mbit/s
  95th percentile per-packet one-way delay: 53.982 ms
  Loss rate: 0.00%
Run 7: Report of Sprout — Data Link

![Graph showing throughput and packet delay over time for Flow 1.]

- Flow 1 ingress (mean 6.92 Mbit/s)
- Flow 1 egress (mean 6.92 Mbit/s)

Flow 1 95th percentile 53.98 ms
Run 8: Statistics of Sprout

Start at: 2018-07-26 14:57:12
End at: 2018-07-26 14:57:42
Local clock offset: 0.145 ms
Remote clock offset: 1.352 ms

# Below is generated by plot.py at 2018-07-26 17:57:19
# Datalink statistics
-- Total of 1 flow:
Average throughput: 7.00 Mbit/s
95th percentile per-packet one-way delay: 55.026 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 7.00 Mbit/s
95th percentile per-packet one-way delay: 55.026 ms
Loss rate: 0.00%
Run 8: Report of Sprout — Data Link

- Throughput (Mbps) vs. Time (s)
  - Flow 1 ingress (mean 7.00 Mbps)
  - Flow 1 egress (mean 7.00 Mbps)

- Per packet one-way delay (ms) vs. Time (s)
  - Flow 1 (95th percentile 55.03 ms)
Run 9: Statistics of Sprout

Start at: 2018-07-26 15:19:12
End at: 2018-07-26 15:19:42
Local clock offset: 0.154 ms
Remote clock offset: -0.064 ms

# Below is generated by plot.py at 2018-07-26 17:57:19
# Datalink statistics
-- Total of 1 flow:
Average throughput: 6.92 Mbit/s
95th percentile per-packet one-way delay: 53.484 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 6.92 Mbit/s
95th percentile per-packet one-way delay: 53.484 ms
Loss rate: 0.00%
Run 9: Report of Sprout — Data Link
Run 10: Statistics of Sprout

Start at: 2018-07-26 15:40:42
End at: 2018-07-26 15:41:12
Local clock offset: -0.039 ms
Remote clock offset: -0.358 ms

# Below is generated by plot.py at 2018-07-26 17:57:19
# Datalink statistics
-- Total of 1 flow:
  Average throughput: 7.50 Mbit/s
  95th percentile per-packet one-way delay: 53.403 ms
  Loss rate: 0.00%
-- Flow 1:
  Average throughput: 7.50 Mbit/s
  95th percentile per-packet one-way delay: 53.403 ms
  Loss rate: 0.00%
Run 10: Report of Sprout — Data Link

![Graphs showing throughput and packet delay over time.](image-url)
Run 1: Statistics of TaoVA-100x

Start at: 2018-07-26 12:16:00
End at: 2018-07-26 12:16:30
Local clock offset: 0.094 ms
Remote clock offset: 0.156 ms
Run 1: Report of TaoVA-100x — Data Link

Throughput (Mbps)

Time (s)

Flow 1 ingress (mean 57.31 Mbit/s) — Flow 1 egress (mean 57.30 Mbit/s)

Per-packet one-way delays (ms)

Time (s)

Flow 1 (95th percentile 53.62 ms)
Run 2: Statistics of TaoVA-100x

Start at: 2018-07-26 12:37:47
End at: 2018-07-26 12:38:18
Local clock offset: -0.226 ms
Remote clock offset: -0.129 ms

# Below is generated by plot.py at 2018-07-26 17:57:19
# Datalink statistics
-- Total of 1 flow:
Average throughput: 12.47 Mbit/s
95th percentile per-packet one-way delay: 53.305 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 12.47 Mbit/s
95th percentile per-packet one-way delay: 53.305 ms
Loss rate: 0.00%
Run 2: Report of TaoVA-100x — Data Link
Run 3: Statistics of TaoVA-100x

Start at: 2018-07-26 12:59:44
End at: 2018-07-26 13:00:14
Local clock offset: 0.042 ms
Remote clock offset: -0.123 ms

# Below is generated by plot.py at 2018-07-26 17:57:19
# Datalink statistics
-- Total of 1 flow:
Average throughput: 140.11 Mbit/s
95th percentile per-packet one-way delay: 50.443 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 140.11 Mbit/s
95th percentile per-packet one-way delay: 50.443 ms
Loss rate: 0.00%
Run 3: Report of TaoVA-100x — Data Link

![Graph 1](image1)

Time (s)

Throughput (Mbit/s)

- Flow 1 ingress (mean 140.12 Mbit/s)
- Flow 1 egress (mean 140.11 Mbit/s)

![Graph 2](image2)

Per packet one way delay (ms)

Time (s)

Flow 1 (95th percentile 50.44 ms)
Run 4: Statistics of TaoVA-100x

Local clock offset: -0.178 ms
Remote clock offset: 0.103 ms
Run 4: Report of TaoVA-100x — Data Link

![Graph of throughput and delay over time for two flows, showing steady increases and occasional spikes.](image-url)
Run 5: Statistics of TaoVA-100x

Start at: 2018-07-26 13:44:03
End at: 2018-07-26 13:44:33
Local clock offset: 0.017 ms
Remote clock offset: 0.027 ms

# Below is generated by plot.py at 2018-07-26 17:57:19
# Datalink statistics
-- Total of 1 flow:
Average throughput: 21.55 Mbit/s
95th percentile per-packet one-way delay: 53.663 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 21.55 Mbit/s
95th percentile per-packet one-way delay: 53.663 ms
Loss rate: 0.00%
Run 5: Report of TaoVA-100x — Data Link

Graph 1: Throughput (Mbps) over Time (s)
- Flow 1 ingress (mean 21.55 Mbit/s)
- Flow 1 egress (mean 21.55 Mbit/s)

Graph 2: Per-packet one-way delay (ms) over Time (s)
- Flow 1 (95th percentile 53.66 ms)
Run 6: Statistics of TaoVA-100x

Start at: 2018-07-26 14:05:27
End at: 2018-07-26 14:05:57
Local clock offset: -0.051 ms
Remote clock offset: 0.171 ms

# Below is generated by plot.py at 2018-07-26 17:57:19
# Datalink statistics
-- Total of 1 flow:
Average throughput: 130.89 Mbit/s
95th percentile per-packet one-way delay: 50.866 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 130.89 Mbit/s
95th percentile per-packet one-way delay: 50.866 ms
Loss rate: 0.00%
Run 6: Report of TaoVA-100x — Data Link

![Graph showing throughput and packet delay over time for two data flows.]

- Flow 1 ingress (mean 130.89 Mbit/s)
- Flow 1 egress (mean 130.89 Mbit/s)

![Graph showing per-packet one-way delay over time for Flow 1.]

- Flow 1 (95th percentile 50.87 ms)
Run 7: Statistics of TaoVA-100x

Start at: 2018-07-26 14:27:16
End at: 2018-07-26 14:27:46
Local clock offset: 0.002 ms
Remote clock offset: 0.135 ms

# Below is generated by plot.py at 2018-07-26 17:57:19
# Datalink statistics
-- Total of 1 flow:
Average throughput: 17.91 Mbit/s
95th percentile per-packet one-way delay: 53.775 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 17.91 Mbit/s
95th percentile per-packet one-way delay: 53.775 ms
Loss rate: 0.00%
Run 7: Report of TaoVA-100x — Data Link

![Graph 1: Throughput (Mbps)](image1)

- **Flow 1 ingress** (mean 17.91 Mbit/s)
- **Flow 1 egress** (mean 17.91 Mbit/s)

![Graph 2: Per-packet one-way delay (ms)](image2)

- **Flow 1 (95th percentile 53.77 ms)**
Run 8: Statistics of TaoVA-100x

Start at: 2018-07-26 14:49:12
End at: 2018-07-26 14:49:42
Local clock offset: 0.019 ms
Remote clock offset: -0.011 ms

# Below is generated by plot.py at 2018-07-26 18:00:29
# Datalink statistics
-- Total of 1 flow:
Average throughput: 234.67 Mbit/s
95th percentile per-packet one-way delay: 53.305 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 234.67 Mbit/s
95th percentile per-packet one-way delay: 53.305 ms
Loss rate: 0.00%
Run 8: Report of TaoVA-100x — Data Link
Run 9: Statistics of TaoVA-100x

Start at: 2018-07-26 15:11:25
End at: 2018-07-26 15:11:55
Local clock offset: 0.299 ms
Remote clock offset: 0.098 ms

# Below is generated by plot.py at 2018-07-26 18:00:29
# Datalink statistics
-- Total of 1 flow:
Average throughput: 55.19 Mbit/s
95th percentile per-packet one-way delay: 52.883 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 55.19 Mbit/s
95th percentile per-packet one-way delay: 52.883 ms
Loss rate: 0.00%
Run 9: Report of TaoVA-100x — Data Link

![Graph showing throughput and delay over time.](image_url)

- **Throughput (Mbps)**: The graph indicates a peak throughput of around 310 Mbps, followed by a sharp drop to near 0 Mbps for a short period, and then stabilizes at a lower value.
- **Time (s)**: The x-axis represents time in seconds, ranging from 0 to 30 seconds.
- **Flow 1 ingress (mean 55.19 Mbit/s)**: The blue dashed line represents the ingress data rate, showing a consistent rate of approximately 55.19 Mbit/s.
- **Flow 1 egress (mean 55.19 Mbit/s)**: The solid blue line represents the egress data rate, which mirrors the ingress rate closely.

**Per-packet one-way delay (ms)**:

- The y-axis represents delay in milliseconds, ranging from 50 to 55 ms.
- The graph shows a spread of delays with a general trend line, indicating a consistent but variable delay over time.
- **Flow 1 (95th percentile 52.88 ms)**: The red dot line marks the 95th percentile delay, which is 52.88 ms.
Run 10: Statistics of TaoVA-100x

Start at: 2018-07-26 15:33:01
End at: 2018-07-26 15:33:31
Local clock offset: ~0.013 ms
Remote clock offset: 1.242 ms
Run 10: Report of TaoVA-100x — Data Link

![Graph 1: Throughput (Mbps)](image1)

- **Flow 1 ingress (mean 110.57 Mbit/s)**
- **Flow 1 egress (mean 110.53 Mbit/s)**

![Graph 2: Per-packet one-way delay (ms)](image2)

- **Flow 1 (95th percentile 54.68 ms)**
Run 1: Statistics of TCP Vegas

Start at: 2018-07-26 12:17:07  
End at: 2018-07-26 12:17:37  
Local clock offset: -0.004 ms  
Remote clock offset: 0.212 ms

# Below is generated by plot.py at 2018-07-26 18:00:29  
# Datalink statistics
-- Total of 1 flow:
Average throughput: 220.30 Mbit/s  
95th percentile per-packet one-way delay: 60.094 ms  
Loss rate: 0.00% 
-- Flow 1:
Average throughput: 220.30 Mbit/s  
95th percentile per-packet one-way delay: 60.094 ms  
Loss rate: 0.00%
Run 1: Report of TCP Vegas — Data Link
Run 2: Statistics of TCP Vegas

Start at: 2018-07-26 12:38:54
End at: 2018-07-26 12:39:24
Local clock offset: -0.054 ms
Remote clock offset: 0.201 ms

# Below is generated by plot.py at 2018-07-26 18:00:29
# Datalink statistics
-- Total of 1 flow:
  Average throughput: 108.41 Mbit/s
  95th percentile per-packet one-way delay: 54.459 ms
  Loss rate: 0.00%
-- Flow 1:
  Average throughput: 108.41 Mbit/s
  95th percentile per-packet one-way delay: 54.459 ms
  Loss rate: 0.00%
Run 2: Report of TCP Vegas — Data Link

[Graphs showing throughput and packet size distribution over time]
Run 3: Statistics of TCP Vegas

Start at: 2018-07-26 13:01:01
End at: 2018-07-26 13:01:31
Local clock offset: 0.146 ms
Remote clock offset: 1.041 ms

# Below is generated by plot.py at 2018-07-26 18:00:29
# Datalink statistics
-- Total of 1 flow:
Average throughput: 73.93 Mbit/s
95th percentile per-packet one-way delay: 55.432 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 73.93 Mbit/s
95th percentile per-packet one-way delay: 55.432 ms
Loss rate: 0.00%
Run 3: Report of TCP Vegas — Data Link
Run 4: Statistics of TCP Vegas

Local clock offset: -0.089 ms
Remote clock offset: -0.122 ms

# Below is generated by plot.py at 2018-07-26 18:00:29
# Datalink statistics
-- Total of 1 flow:
Average throughput: 48.14 Mbit/s
95th percentile per-packet one-way delay: 54.510 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 48.14 Mbit/s
95th percentile per-packet one-way delay: 54.510 ms
Loss rate: 0.00%
Run 4: Report of TCP Vegas — Data Link

![Graph showing throughput and delay over time for TCP Vegas run 4. The graph indicates fluctuations in throughput and packet delay with time, highlighting the network's performance characteristics.](image-url)
Run 5: Statistics of TCP Vegas

Start at: 2018-07-26 13:45:10
End at: 2018-07-26 13:45:40
Local clock offset: -0.053 ms
Remote clock offset: -0.0 ms

# Below is generated by plot.py at 2018-07-26 18:00:29
# Datalink statistics
-- Total of 1 flow:
Average throughput: 18.92 Mbit/s
95th percentile per-packet one-way delay: 54.430 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 18.92 Mbit/s
95th percentile per-packet one-way delay: 54.430 ms
Loss rate: 0.00%
Run 5: Report of TCP Vegas — Data Link
Run 6: Statistics of TCP Vegas

Start at: 2018-07-26 14:06:43
End at: 2018-07-26 14:07:13
Local clock offset: 0.062 ms
Remote clock offset: 1.185 ms

# Below is generated by plot.py at 2018-07-26 18:00:29
# Datalink statistics
-- Total of 1 flow:
Average throughput: 23.04 Mbit/s
95th percentile per-packet one-way delay: 55.598 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 23.04 Mbit/s
95th percentile per-packet one-way delay: 55.598 ms
Loss rate: 0.00%
Run 6: Report of TCP Vegas — Data Link
Run 7: Statistics of TCP Vegas

Start at: 2018-07-26 14:28:23
End at: 2018-07-26 14:28:53
Local clock offset: 0.196 ms
Remote clock offset: 1.197 ms

# Below is generated by plot.py at 2018-07-26 18:00:30
# Datalink statistics
-- Total of 1 flow:
Average throughput: 108.84 Mbit/s
95th percentile per-packet one-way delay: 54.835 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 108.84 Mbit/s
95th percentile per-packet one-way delay: 54.835 ms
Loss rate: 0.00%
Run 7: Report of TCP Vegas — Data Link

![Graph of throughput and packet delay over time]

- Flow 1 ingress (mean 108.84 Mbit/s)
- Flow 1 egress (mean 108.84 Mbit/s)

- Flow 1 (95th percentile 54.84 ms)
Run 8: Statistics of TCP Vegas

Start at: 2018-07-26 14:50:38
End at: 2018-07-26 14:51:08
Local clock offset: 0.004 ms
Remote clock offset: -0.1 ms

# Below is generated by plot.py at 2018-07-26 18:00:30
# Datalink statistics
-- Total of 1 flow:
Average throughput: 96.42 Mbit/s
95th percentile per-packet one-way delay: 53.843 ms
Loss rate: 0.00%

-- Flow 1:
Average throughput: 96.42 Mbit/s
95th percentile per-packet one-way delay: 53.843 ms
Loss rate: 0.00%
Run 8: Report of TCP Vegas — Data Link
Run 9: Statistics of TCP Vegas

Start at: 2018-07-26 15:12:36
End at: 2018-07-26 15:13:06
Local clock offset: 0.072 ms
Remote clock offset: 1.326 ms

# Below is generated by plot.py at 2018-07-26 18:00:30
# Datalink statistics
-- Total of 1 flow:
Average throughput: 211.75 Mbit/s
95th percentile per-packet one-way delay: 61.647 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 211.75 Mbit/s
95th percentile per-packet one-way delay: 61.647 ms
Loss rate: 0.00%
Run 9: Report of TCP Vegas — Data Link

![Graph 1: Throughput (Mbps)]

- Flow 1 ingress (mean 211.79 Mbit/s)
- Flow 1 egress (mean 211.75 Mbit/s)

![Graph 2: Per-packet one-way delay (ms)]

- Flow 1 (95th percentile 61.65 ms)
Run 10: Statistics of TCP Vegas

Start at: 2018-07-26 15:34:08
End at: 2018-07-26 15:34:38
Local clock offset: 0.132 ms
Remote clock offset: -1.411 ms

# Below is generated by plot.py at 2018-07-26 18:00:30
# Datalink statistics
-- Total of 1 flow:
Average throughput: 67.94 Mbit/s
95th percentile per-packet one-way delay: 52.320 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 67.94 Mbit/s
95th percentile per-packet one-way delay: 52.320 ms
Loss rate: 0.00%
Run 10: Report of TCP Vegas — Data Link

![Graph of throughput and delay over time]

- **Flow 1 ingress (mean 67.93 Mbit/s)**
- **Flow 1 egress (mean 67.94 Mbit/s)**

- **Flow 1 (95th percentile 52.32 ms)**
Run 1: Statistics of Verus

Start at: 2018-07-26 12:19:39
End at: 2018-07-26 12:20:09
Local clock offset: 0.097 ms
Remote clock offset: 0.192 ms

# Below is generated by plot.py at 2018-07-26 18:02:03
# Datalink statistics
-- Total of 1 flow:
Average throughput: 211.93 Mbit/s
95th percentile per-packet one-way delay: 80.483 ms
Loss rate: 0.01%
-- Flow 1:
Average throughput: 211.93 Mbit/s
95th percentile per-packet one-way delay: 80.483 ms
Loss rate: 0.01%
Run 1: Report of Verus — Data Link

![Graph showing throughput and packet delay over time for Flow 1 with mean 211.97 Mbps for ingress and 211.93 Mbps for egress.]

- Flow 1 ingress (mean 211.97 Mbps)
- Flow 1 egress (mean 211.93 Mbps)

- Flow 1 (95th percentile 80.48 ms)
Run 2: Statistics of Verus

Start at: 2018-07-26 12:41:21
End at: 2018-07-26 12:41:51
Local clock offset: 0.088 ms
Remote clock offset: 0.206 ms

# Below is generated by plot.py at 2018-07-26 18:02:30
# Datalink statistics
-- Total of 1 flow:
Average throughput: 239.54 Mbit/s
95th percentile per-packet one-way delay: 78.021 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 239.54 Mbit/s
95th percentile per-packet one-way delay: 78.021 ms
Loss rate: 0.00%
Run 2: Report of Verus — Data Link

![Graph 1: Throughput vs. Time](image1)

![Graph 2: Packet Delay vs. Time](image2)
Run 3: Statistics of Verus

Start at: 2018-07-26 13:03:26
End at: 2018-07-26 13:03:56
Local clock offset: -0.092 ms
Remote clock offset: 1.353 ms

# Below is generated by plot.py at 2018-07-26 18:03:19
# Datalink statistics
-- Total of 1 flow:
Average throughput: 285.26 Mbit/s
95th percentile per-packet one-way delay: 88.276 ms
Loss rate: 0.11%
-- Flow 1:
Average throughput: 285.26 Mbit/s
95th percentile per-packet one-way delay: 88.276 ms
Loss rate: 0.11%
Run 3: Report of Verus — Data Link

![Graph 1: Throughput (Mbps)](image1)

![Graph 2: Per-packet one-way delay (ms)](image2)
Run 4: Statistics of Verus

End at: 2018-07-26 13:26:01
Local clock offset: -0.185 ms
Remote clock offset: 0.222 ms

# Below is generated by plot.py at 2018-07-26 18:03:19
# Datalink statistics
-- Total of 1 flow:
Average throughput: 208.21 Mbit/s
95th percentile per-packet one-way delay: 81.196 ms
Loss rate: 0.13%
-- Flow 1:
Average throughput: 208.21 Mbit/s
95th percentile per-packet one-way delay: 81.196 ms
Loss rate: 0.13%
Run 5: Statistics of Verus

Start at: 2018-07-26 13:47:34
Local clock offset: -0.054 ms
Remote clock offset: 0.106 ms

# Below is generated by plot.py at 2018-07-26 18:03:19
# Datalink statistics
-- Total of 1 flow:
  Average throughput: 213.06 Mbit/s
  95th percentile per-packet one-way delay: 75.668 ms
  Loss rate: 0.00%
-- Flow 1:
  Average throughput: 213.06 Mbit/s
  95th percentile per-packet one-way delay: 75.668 ms
  Loss rate: 0.00%
Run 5: Report of Verus — Data Link

![Graph showing throughput over time for two flows, Flow 1 ingress and Flow 1 egress.](image)

- Flow 1 ingress (mean 213.04 Mbit/s)
- Flow 1 egress (mean 213.06 Mbit/s)

![Graph showing packet delay over time for Flow 1.](image)

- Flow 1 (95th percentile 75.67 ms)
Run 6: Statistics of Verus

Start at: 2018-07-26 14:09:06
End at: 2018-07-26 14:09:36
Local clock offset: 0.196 ms
Remote clock offset: -0.223 ms

# Below is generated by plot.py at 2018-07-26 18:03:19
# Datalink statistics
-- Total of 1 flow:
Average throughput: 254.47 Mbit/s
95th percentile per-packet one-way delay: 81.246 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 254.47 Mbit/s
95th percentile per-packet one-way delay: 81.246 ms
Loss rate: 0.00%
Run 6: Report of Verus — Data Link

![Graph 1](image1.png)

Flow 1 ingress (mean 254.59 Mbit/s)  
Flow 1 egress (mean 254.47 Mbit/s)

![Graph 2](image2.png)

Flow 1 (95th percentile 81.25 ms)
Run 7: Statistics of Verus

Start at: 2018-07-26 14:30:50
End at: 2018-07-26 14:31:20
Local clock offset: 0.162 ms
Remote clock offset: -0.031 ms

# Below is generated by plot.py at 2018-07-26 18:05:59
# Datalink statistics
-- Total of 1 flow:
Average throughput: 262.74 Mbit/s
95th percentile per-packet one-way delay: 134.632 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 262.74 Mbit/s
95th percentile per-packet one-way delay: 134.632 ms
Loss rate: 0.00%
Run 7: Report of Verus — Data Link

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**Graph 1:**
Throughput (Mbps)

- Flow 1 ingress (mean 262.74 Mbps)
- Flow 1 egress (mean 262.74 Mbps)

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**Graph 2:**
Per packet one way delay (ms)

- Flow 1 (95th percentile 134.63 ms)

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Run 8: Statistics of Verus

Start at: 2018-07-26 14:53:03
End at: 2018-07-26 14:53:33
Local clock offset: 0.038 ms
Remote clock offset: 0.021 ms

# Below is generated by plot.py at 2018-07-26 18:06:26
# Datalink statistics
-- Total of 1 flow:
Average throughput: 277.77 Mbit/s
95th percentile per-packet one-way delay: 96.852 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 277.77 Mbit/s
95th percentile per-packet one-way delay: 96.852 ms
Loss rate: 0.00%
Run 8: Report of Verus — Data Link

![Graph 1: Throughput (Mbps)](image1)

- Flow 1 ingress (mean 277.99 Mbit/s)
- Flow 1 egress (mean 277.77 Mbit/s)

![Graph 2: Per packet one way delay (ms)](image2)

- Flow 1 (95th percentile 96.85 ms)
Run 9: Statistics of Verus

Start at: 2018-07-26 15:15:07
End at: 2018-07-26 15:15:37
Local clock offset: 0.023 ms
Remote clock offset: -0.113 ms

# Below is generated by plot.py at 2018-07-26 18:06:52
# Datalink statistics
-- Total of 1 flow:
Average throughput: 242.42 Mbit/s
95th percentile per-packet one-way delay: 78.006 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 242.42 Mbit/s
95th percentile per-packet one-way delay: 78.006 ms
Loss rate: 0.00%
Run 9: Report of Verus — Data Link

![Graph showing throughput and packet delay](image)

- Flow 1 ingress (mean 242.42 Mbit/s)
- Flow 1 egress (mean 242.42 Mbit/s)

- Flow 1 (95th percentile 78.01 ms)
Run 10: Statistics of Verus

Start at: 2018-07-26 15:36:32
End at: 2018-07-26 15:37:02
Local clock offset: 0.099 ms
Remote clock offset: -0.385 ms

# Below is generated by plot.py at 2018-07-26 18:07:21
# Datalink statistics
-- Total of 1 flow:
Average throughput: 267.67 Mbit/s
95th percentile per-packet one-way delay: 98.312 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 267.67 Mbit/s
95th percentile per-packet one-way delay: 98.312 ms
Loss rate: 0.00%
Run 10: Report of Verus — Data Link

![Graph showing throughput and packet delay over time](image)
Run 1: Statistics of PCC-Vivace

Start at: 2018-07-26 12:14:31
End at: 2018-07-26 12:15:01
Local clock offset: 0.034 ms
Remote clock offset: -0.167 ms

# Below is generated by plot.py at 2018-07-26 18:10:20
# Datalink statistics
-- Total of 1 flow:
Average throughput: 370.50 Mbit/s
95th percentile per-packet one-way delay: 52.991 ms
Loss rate: 0.03%
-- Flow 1:
Average throughput: 370.50 Mbit/s
95th percentile per-packet one-way delay: 52.991 ms
Loss rate: 0.03%
Run 1: Report of PCC-Vivace — Data Link
Run 2: Statistics of PCC-Vivace

Start at: 2018-07-26 12:36:23
End at: 2018-07-26 12:36:53
Local clock offset: 0.004 ms
Remote clock offset: 0.03 ms

# Below is generated by plot.py at 2018-07-26 18:10:20
# Datalink statistics
-- Total of 1 flow:
Average throughput: 293.29 Mbit/s
95th percentile per-packet one-way delay: 50.549 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 293.29 Mbit/s
95th percentile per-packet one-way delay: 50.549 ms
Loss rate: 0.00%
Run 2: Report of PCC-Vivace — Data Link

![Graph 1: Throughput (Mbps)](image)

- *Flow 1 ingress (mean 293.28 Mbit/s)*
- *Flow 1 egress (mean 293.29 Mbit/s)*

![Graph 2: Pre-packet one-way delay (ms)](image)

- *Flow 1 (95th percentile 50.55 ms)*
Run 3: Statistics of PCC-Vivace

Start at: 2018-07-26 12:58:15
End at: 2018-07-26 12:58:45
Local clock offset: -0.043 ms
Remote clock offset: 0.015 ms

# Below is generated by plot.py at 2018-07-26 18:11:46
# Datalink statistics
-- Total of 1 flow:
Average throughput: 366.76 Mbit/s
95th percentile per-packet one-way delay: 53.566 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 366.76 Mbit/s
95th percentile per-packet one-way delay: 53.566 ms
Loss rate: 0.00%
Run 3: Report of PCC-Vivace — Data Link

[Graphs showing throughput and packet delay over time]
Run 4: Statistics of PCC-Vivace

End at: 2018-07-26 13:21:03
Local clock offset: -0.063 ms
Remote clock offset: 0.017 ms

# Below is generated by plot.py at 2018-07-26 18:11:46
# Datalink statistics
-- Total of 1 flow:
Average throughput: 353.27 Mbit/s
95th percentile per-packet one-way delay: 53.622 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 353.27 Mbit/s
95th percentile per-packet one-way delay: 53.622 ms
Loss rate: 0.00%
Run 4: Report of PCC-Vivace — Data Link
Run 5: Statistics of PCC-Vivace

Start at: 2018-07-26 13:42:34
End at: 2018-07-26 13:43:04
Local clock offset: 0.091 ms
Remote clock offset: -0.024 ms

# Below is generated by plot.py at 2018-07-26 18:13:31
# Datalink statistics
-- Total of 1 flow:
Average throughput: 349.56 Mbit/s
95th percentile per-packet one-way delay: 50.426 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 349.56 Mbit/s
95th percentile per-packet one-way delay: 50.426 ms
Loss rate: 0.00%
Run 5: Report of PCC-Vivace — Data Link

![Graph 1: Throughput vs Time (Mbps)](image1)

![Graph 2: Packet delay vs Time (ms)](image2)
Run 6: Statistics of PCC-Vivace

Start at: 2018-07-26 14:04:02
End at: 2018-07-26 14:04:32
Local clock offset: 0.059 ms
Remote clock offset: -0.282 ms

# Below is generated by plot.py at 2018-07-26 18:13:31
# Datalink statistics
-- Total of 1 flow:
Average throughput: 302.39 Mbit/s
95th percentile per-packet one-way delay: 53.447 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 302.39 Mbit/s
95th percentile per-packet one-way delay: 53.447 ms
Loss rate: 0.00%
Run 6: Report of PCC-Vivace — Data Link
Run 7: Statistics of PCC-Vivace

Start at: 2018-07-26 14:25:47
End at: 2018-07-26 14:26:17
Local clock offset: -0.031 ms
Remote clock offset: -0.057 ms

# Below is generated by plot.py at 2018-07-26 18:14:12
# Datalink statistics
-- Total of 1 flow:
Average throughput: 372.12 Mbit/s
95th percentile per-packet one-way delay: 162.371 ms
Loss rate: 0.42%
-- Flow 1:
Average throughput: 372.12 Mbit/s
95th percentile per-packet one-way delay: 162.371 ms
Loss rate: 0.42%
Run 7: Report of PCC-Vivace — Data Link
Run 8: Statistics of PCC-Vivace

Start at: 2018-07-26 14:47:44
End at: 2018-07-26 14:48:14
Local clock offset: -0.003 ms
Remote clock offset: 0.108 ms

# Below is generated by plot.py at 2018-07-26 18:14:17
# Datalink statistics
-- Total of 1 flow:
Average throughput: 358.98 Mbit/s
95th percentile per-packet one-way delay: 50.447 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 358.98 Mbit/s
95th percentile per-packet one-way delay: 50.447 ms
Loss rate: 0.00%
Run 8: Report of PCC-Vivace — Data Link

![Graph showing throughput and packet delay over time for a data link test. The graph includes a line chart with two distinct time series for throughput and packet delay, each labeled for ingress and egress traffic. The throughput chart indicates a sharp initial increase followed by stabilization, while the packet delay chart shows a consistent trend with a noted 95th percentile delay.]
Run 9: Statistics of PCC-Vivace

Start at: 2018-07-26 15:09:57
End at: 2018-07-26 15:10:27
Local clock offset: -0.187 ms
Remote clock offset: 0.05 ms

# Below is generated by plot.py at 2018-07-26 18:14:38
# Datalink statistics
-- Total of 1 flow:
  Average throughput: 352.86 Mbit/s
  95th percentile per-packet one-way delay: 53.446 ms
  Loss rate: 0.00%
-- Flow 1:
  Average throughput: 352.86 Mbit/s
  95th percentile per-packet one-way delay: 53.446 ms
  Loss rate: 0.00%
Run 9: Report of PCC-Vivace — Data Link

![Graph 1: Throughput vs Time](image1)

- Flow 1 ingress (mean 352.86 Mbit/s)
- Flow 1 egress (mean 352.86 Mbit/s)

![Graph 2: Packet Delay vs Time](image2)

- Flow 1 (95th percentile 53.45 ms)
Run 10: Statistics of PCC-Vivace

Start at: 2018-07-26 15:31:35
End at: 2018-07-26 15:32:05
Local clock offset: -0.133 ms
Remote clock offset: 1.291 ms

# Below is generated by plot.py at 2018-07-26 18:14:40
# Datalink statistics
-- Total of 1 flow:
Average throughput: 331.21 Mbit/s
95th percentile per-packet one-way delay: 55.147 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 331.21 Mbit/s
95th percentile per-packet one-way delay: 55.147 ms
Loss rate: 0.00%
Run 1: Statistics of WebRTC media

Start at: 2018-07-26 12:32:41
End at: 2018-07-26 12:33:11
Local clock offset: -0.033 ms
Remote clock offset: -0.066 ms

# Below is generated by plot.py at 2018-07-26 18:14:40
# Datalink statistics
-- Total of 1 flow:
Average throughput: 2.19 Mbit/s
95th percentile per-packet one-way delay: 53.531 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 2.19 Mbit/s
95th percentile per-packet one-way delay: 53.531 ms
Loss rate: 0.00%
Run 1: Report of WebRTC media — Data Link

![Graph 1: Throughput (Mbps) vs Time (s)]

- Flow 1 ingress (mean 2.19 Mbit/s)
- Flow 1 egress (mean 2.19 Mbit/s)

![Graph 2: Packet delay (ms) vs Time (s)]

- Flow 1 (95th percentile 53.53 ms)
Run 2: Statistics of WebRTC media

Start at: 2018-07-26 12:54:34
Local clock offset: -0.034 ms
Remote clock offset: 0.249 ms

# Below is generated by plot.py at 2018-07-26 18:14:40
# Datalink statistics
-- Total of 1 flow:
  Average throughput: 2.02 Mbit/s
  95th percentile per-packet one-way delay: 53.732 ms
  Loss rate: 0.00%
-- Flow 1:
  Average throughput: 2.02 Mbit/s
  95th percentile per-packet one-way delay: 53.732 ms
  Loss rate: 0.00%
Run 2: Report of WebRTC media — Data Link
Run 3: Statistics of WebRTC media

End at: 2018-07-26 13:17:11
Local clock offset: -0.136 ms
Remote clock offset: 0.013 ms

# Below is generated by plot.py at 2018-07-26 18:14:40
# Datalink statistics
-- Total of 1 flow:
Average throughput: 1.96 Mbit/s
95th percentile per-packet one-way delay: 50.894 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 1.96 Mbit/s
95th percentile per-packet one-way delay: 50.894 ms
Loss rate: 0.00%
Run 3: Report of WebRTC media — Data Link

![Graphs showing throughput and packet delay over time for WebRTC media runs.]

Throughput (Mbit/s)

Time (s)

Flow 1 ingress (mean 1.96 Mbit/s)  Flow 1 egress (mean 1.96 Mbit/s)

Packet one way delay (ms)

Time (s)

Flow 1 (95th percentile 50.89 ms)
Run 4: Statistics of WebRTC media

End at: 2018-07-26 13:39:09
Local clock offset: -0.045 ms
Remote clock offset: 0.234 ms

# Below is generated by plot.py at 2018-07-26 18:14:40
# Datalink statistics
-- Total of 1 flow:
Average throughput: 1.97 Mbit/s
95th percentile per-packet one-way delay: 50.817 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 1.97 Mbit/s
95th percentile per-packet one-way delay: 50.817 ms
Loss rate: 0.00%
Run 4: Report of WebRTC media — Data Link

The graph shows the throughput (Mbps) over time (s) for two flows: ingress and egress. The throughput varies significantly over time, with peaks and troughs. The legend indicates that Flow 1 ingress has a mean of 1.97 Mbps and Flow 1 egress also has a mean of 1.97 Mbps.

The second graph displays the per-packet one-way delay (ms) over time (s) for Flow 1. The delay remains relatively consistent with minor fluctuations. The legend indicates that Flow 1 has a 95th percentile delay of 50.82 ms.
Run 5: Statistics of WebRTC media

Start at: 2018-07-26 14:00:23
End at: 2018-07-26 14:00:53
Local clock offset: 0.269 ms
Remote clock offset: 0.099 ms

# Below is generated by plot.py at 2018-07-26 18:14:40
# Datalink statistics
-- Total of 1 flow:
Average throughput: 1.93 Mbit/s
95th percentile per-packet one-way delay: 50.486 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 1.93 Mbit/s
95th percentile per-packet one-way delay: 50.486 ms
Loss rate: 0.00%
Run 5: Report of WebRTC media — Data Link

![Data Link Throughput Graph]

- Flow 1 ingress (mean 1.93 Mbit/s)
- Flow 1 egress (mean 1.93 Mbit/s)

![Data Link Packet Delay Graph]

- Flow 1 (95th percentile 50.49 ms)
Run 6: Statistics of WebRTC media

Start at: 2018-07-26 14:22:01
End at: 2018-07-26 14:22:31
Local clock offset: 0.004 ms
Remote clock offset: 0.157 ms

# Below is generated by plot.py at 2018-07-26 18:14:40
# Datalink statistics
-- Total of 1 flow:
Average throughput: 1.93 Mbit/s
95th percentile per-packet one-way delay: 53.945 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 1.93 Mbit/s
95th percentile per-packet one-way delay: 53.945 ms
Loss rate: 0.00%
Run 6: Report of WebRTC media — Data Link

![Graph 1: Throughput (Mbps)]

- Flow 1 ingress (mean 1.93 Mbit/s)
- Flow 1 egress (mean 1.93 Mbit/s)

![Graph 2: Per-packet one-way delay (ms)]

- Flow 1 (95th percentile 53.95 ms)
Run 7: Statistics of WebRTC media

Start at: 2018-07-26 14:43:52
End at: 2018-07-26 14:44:22
Local clock offset: 0.159 ms
Remote clock offset: 0.215 ms

# Below is generated by plot.py at 2018-07-26 18:14:40
# Datalink statistics
-- Total of 1 flow:
Average throughput: 1.94 Mbit/s
95th percentile per-packet one-way delay: 50.644 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 1.94 Mbit/s
95th percentile per-packet one-way delay: 50.644 ms
Loss rate: 0.00%
Run 7: Report of WebRTC media — Data Link

![Graph 1: Throughput (Mbps)](image1.png)

- Flow 1 ingress (mean 1.94 Mbit/s)
- Flow 1 egress (mean 1.94 Mbit/s)

![Graph 2: Per-packet one-way delay (ms)](image2.png)

- Flow 1 95th percentile 50.64 ms
Run 8: Statistics of WebRTC media

Start at: 2018-07-26 15:06:23
End at: 2018-07-26 15:06:53
Local clock offset: -0.021 ms
Remote clock offset: 0.014 ms

# Below is generated by plot.py at 2018-07-26 18:14:40
# Datalink statistics
-- Total of 1 flow:
Average throughput: 1.96 Mbit/s
95th percentile per-packet one-way delay: 53.606 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 1.96 Mbit/s
95th percentile per-packet one-way delay: 53.606 ms
Loss rate: 0.00%
Run 8: Report of WebRTC media — Data Link

![Graph 1: Throughput vs Time](image1)

![Graph 2: Per-packet one-way delay vs Time](image2)
Run 9: Statistics of WebRTC media

Start at: 2018-07-26 15:28:00
End at: 2018-07-26 15:28:30
Local clock offset: 0.046 ms
Remote clock offset: -0.02 ms

# Below is generated by plot.py at 2018-07-26 18:14:40
# Datalink statistics
   -- Total of 1 flow:
Average throughput: 1.94 Mbit/s
95th percentile per-packet one-way delay: 53.850 ms
Loss rate: 0.00%
   -- Flow 1:
Average throughput: 1.94 Mbit/s
95th percentile per-packet one-way delay: 53.850 ms
Loss rate: 0.00%
Run 9: Report of WebRTC media — Data Link

![Throughput Graph](image1)

**Throughput (Mbps)**

- Flow 1 ingress (mean 1.94 Mbps)
- Flow 1 egress (mean 1.94 Mbps)

![Delay Graph](image2)

**Per-packet one-way delay (ms)**

- Flow 1 (95th percentile 53.85 ms)
Run 10: Statistics of WebRTC media

Start at: 2018-07-26 15:49:49
End at: 2018-07-26 15:50:19
Local clock offset: -0.028 ms
Remote clock offset: -0.117 ms

# Below is generated by plot.py at 2018-07-26 18:14:40
# Datalink statistics
-- Total of 1 flow:
Average throughput: 1.94 Mbit/s
95th percentile per-packet one-way delay: 53.766 ms
Loss rate: 0.00%
-- Flow 1:
Average throughput: 1.94 Mbit/s
95th percentile per-packet one-way delay: 53.766 ms
Loss rate: 0.00%
Run 10: Report of WebRTC media — Data Link

![Graph of throughput over time](image1.png)

- Flow 1 ingress (mean 1.94 Mbit/s)
- Flow 1 egress (mean 1.94 Mbit/s)

![Graph of packet delay over time](image2.png)

- Flow 1 (95th percentile 53.77 ms)