

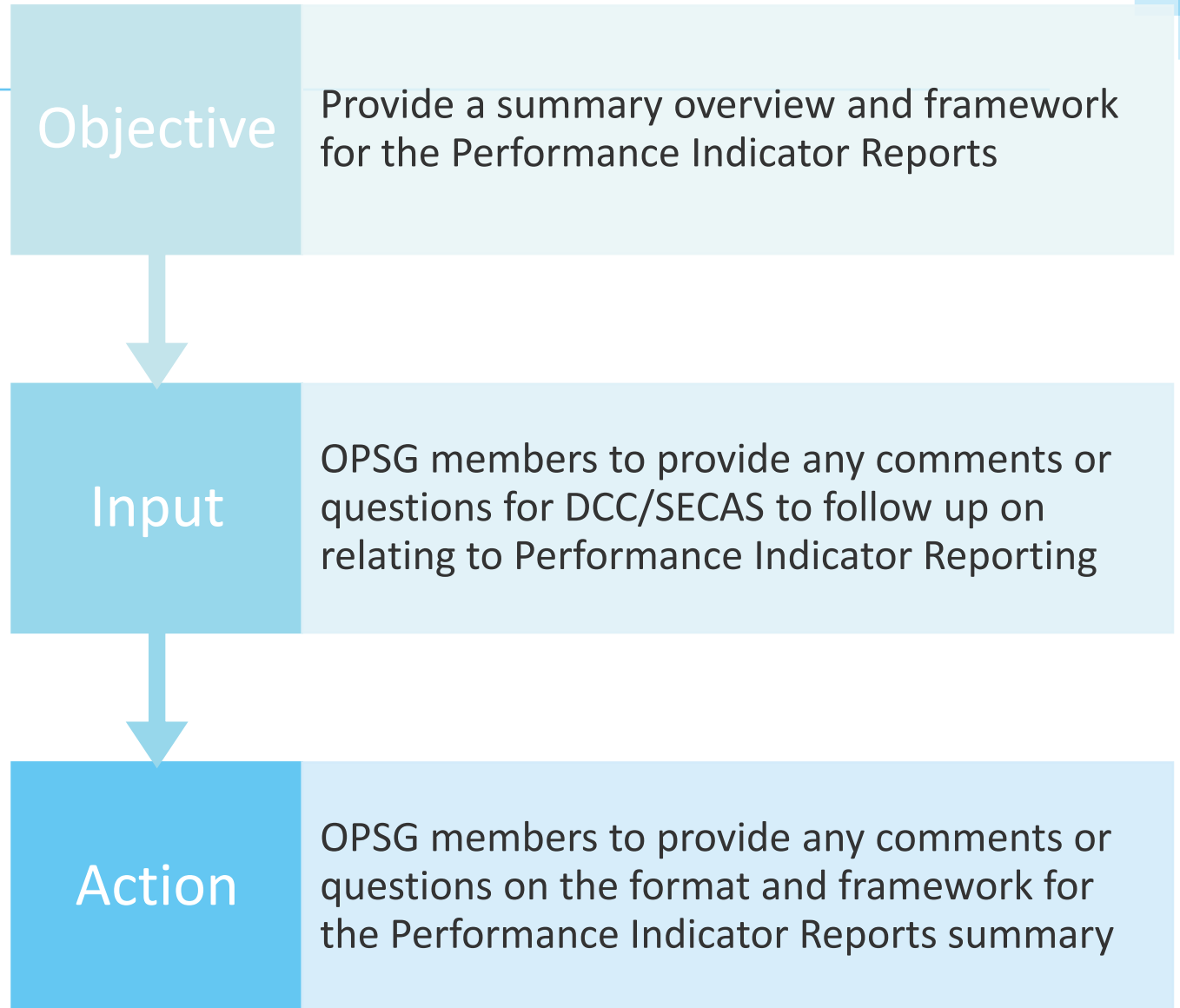
Agenda Item 6

Performance Indicator Reports Summary May 2021

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Performance Indicator Reports – Recommendations



Introductory Slide



- As outlined at OPSG 49 24 May 2021 under the 'Introduction to MP122A Reporting – Business Processes'. This topic aims to provide an overview of the revised reporting that provides visibility of success and failure and Round Trip Times of Service Request Variants (SRVs) that make up key customer business processes.
- The proposal was to include graphs and overview on a standing set of metrics on the following:
 - Install & Commission (SRV8.11, SRV8.1.1, SRV6.20.1, SRV6.8, SRV8.7.2, SRV8.14.1)
 - Change of Supplier (SRV6.23)
 - Tariff Updates (SRV1.1.1)
 - Pre-payment (SRV2.2)
 - Meter Reads (SRV4.6.1, SRV4.8.1, SRV4.10, SRV4.17)
 - Distribution Networks Post I&C Activity (SRV6.15.1 – Update Network Operator Certificates, SRV6.5, SRV6.22)
 - Alerts (AD1)
- With the option to include additional metrics on a monthly Ad-hoc basis dependent on anomalies and changes.

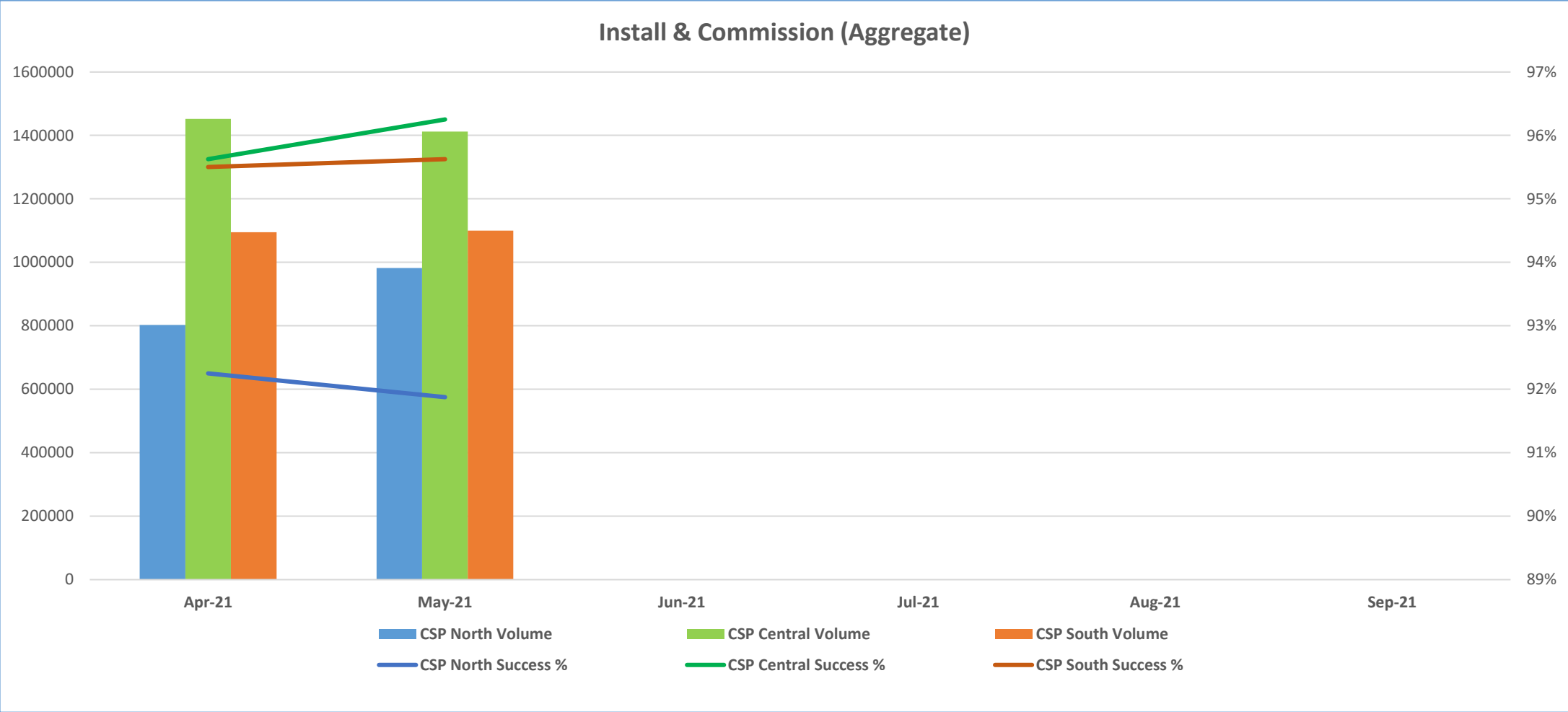
Performance Indicator Reporting – Caveats

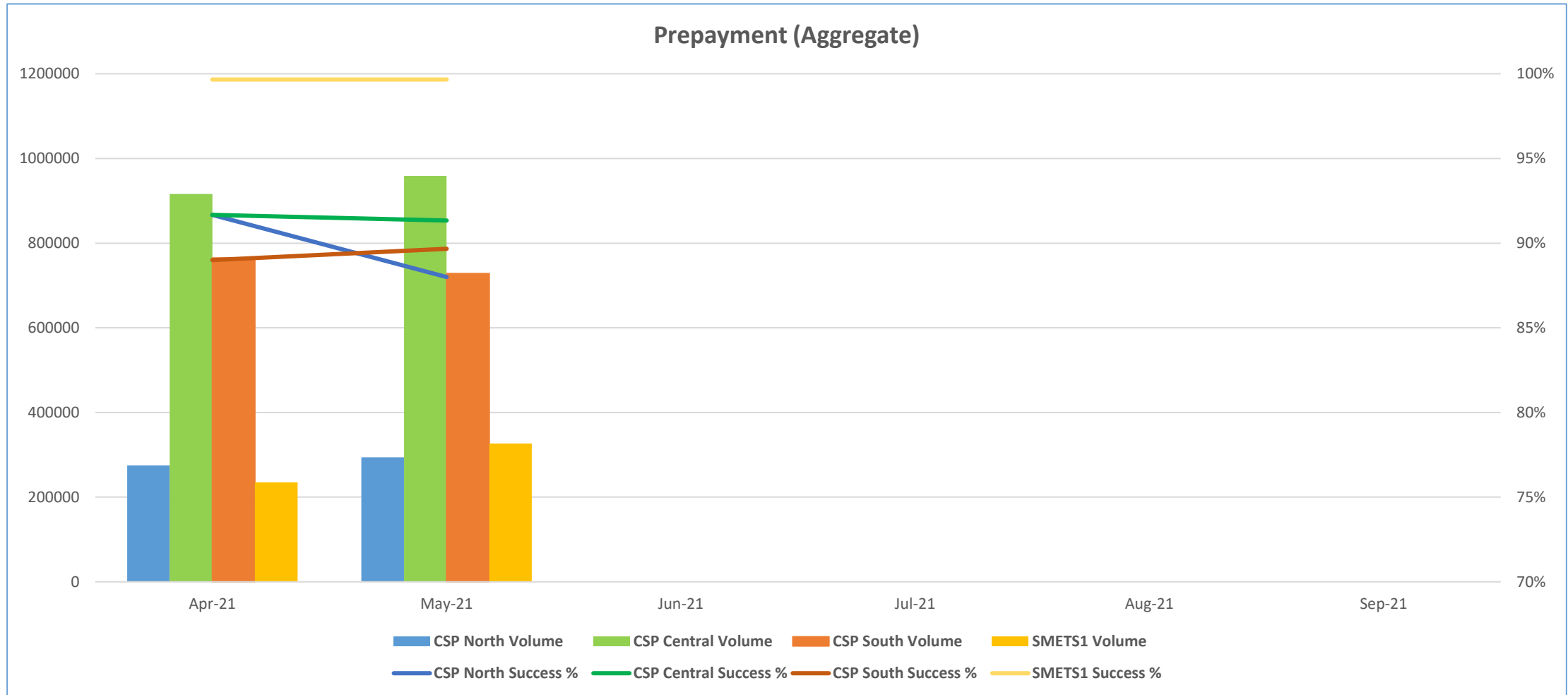


1. The Service Request Variant (SRV) metrics relate to representing Round Trip Time (RTT) i.e. the time taken from receipt of SRVs in DCC (DSP system) through to receipt on the device and the return of responses from that Device to onward transmission through the Service User Gateway. DCC's performance is measured via Target Response Times (TRT) which is a measure that removes Home Area Network (HAN) from the Round Trip Time. These metrics are compared in the reporting to TRT for illustrative purposes to provide an indicative view of system performance.
2. SRVs targeted at Gas Smart Meters (GSME) will only be delivered when the Gas Meter wakes up (i.e. every half an hour). Therefore these provide a very poor measure of DCC performance.
3. Where a Service Request is marked as failure it could have failed because of issues within:
 - a) DCC (including their Service Providers)
 - b) Comms Hubs
 - c) Service User
 - d) DCC Adaptor Provider
 - e) Meter/Other Device

It is difficult to triage individual errors, and impossible to triage errors in bulk through the DCC data alone. DCC will use this report as the starting point for multi-party investigations to improve service across all reported areas. In these instances, DCC are unlikely to be able to identify the reason for failure but may be able to identify some contributing factors.

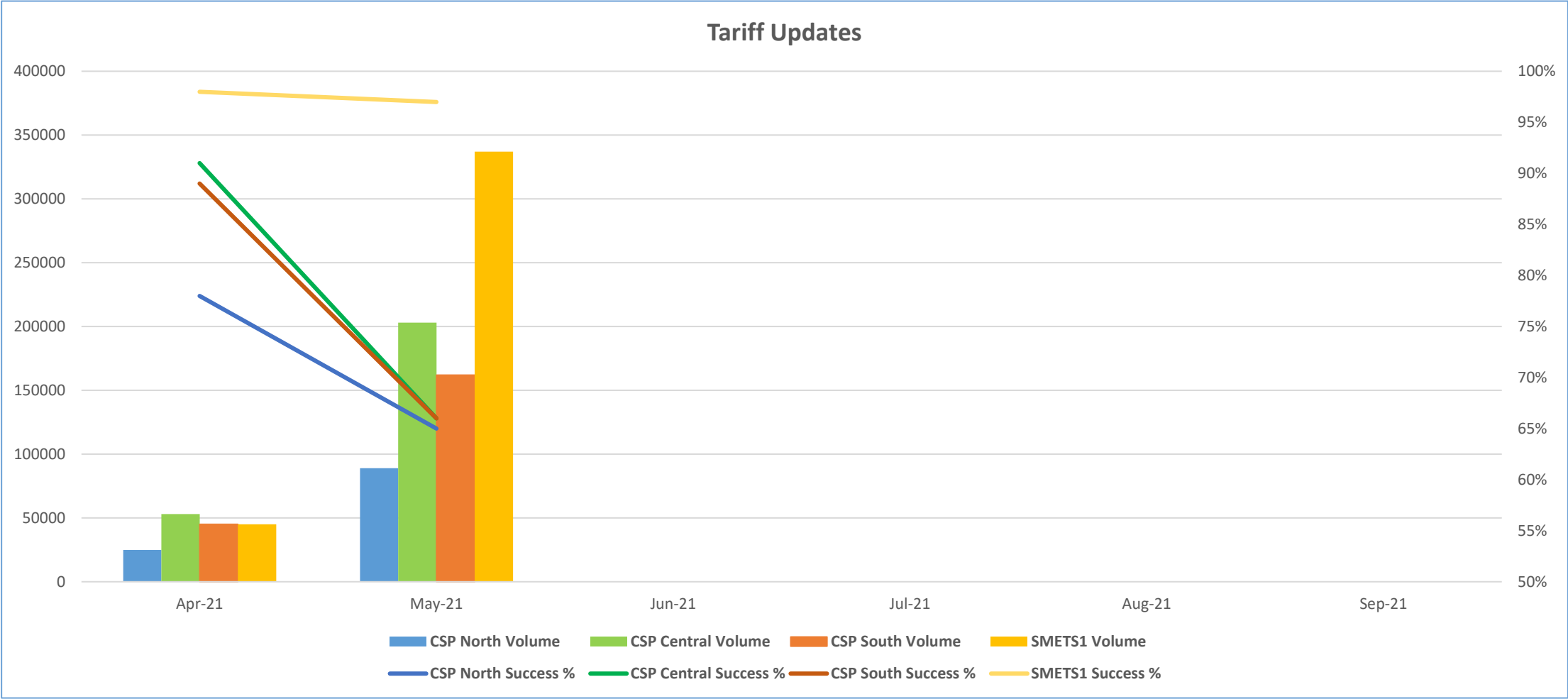
Install & Commission - Trend Analysis (Placeholder)







Tariff Updates - Trend Analysis (Placeholder)



CSP Region – Business Process Performance



| CSP North | Apr-21 | May-21 |
|---|----------|----------|
| Install & Commission (Aggregate) | | |
| Volume | 802000 | 982000 |
| Average Success % | 92% | 92% |
| Average Median RTT (se | 34 | 39 |
| Change of Supply (Aggregate) | | |
| Volume | 391000 | 294000 |
| Average Success % | 85% | 77% |
| Average Median RTT (se | 47 | 49 |
| Prepayment (Aggregate) | | |
| Volume | 275000 | 294000 |
| Average Success % | 92% | 88% |
| Average Median RTT (se | 30 | 32 |
| Meter Reads (Aggregate) | | |
| Volume | 44115000 | 49231000 |
| Average Success % | 81% | 86% |
| Average Median RTT (se | 4368 | 5064 |
| Post I&C (Aggregate) | | |
| Volume | 349000 | 390000 |
| Average Success % | 94% | 95% |
| Average Median RTT (se | 31 | 29 |
| Tariff Update | | |
| Volume | 25000 | 89000 |
| Average Success % | 78% | 65% |
| Average Median RTT (se | 18 | 59 |

| CSP Central | Apr-21 | May-21 |
|---|----------|-----------|
| Install & Commission (Aggregate) | | |
| Volume | 1452000 | 1412000 |
| Average Success % | 96% | 96% |
| Average Median RTT (se | 10 | 10 |
| Change of Supply (Aggregate) | | |
| Volume | 618000 | 674000 |
| Average Success % | 88% | 87% |
| Average Median RTT (se | 15 | 15 |
| Prepayment (Aggregate) | | |
| Volume | 916000 | 959000 |
| Average Success % | 92% | 91% |
| Average Median RTT (se | 9 | 9 |
| Meter Reads (Aggregate) | | |
| Volume | 95523000 | 104858000 |
| Average Success % | 93% | 93% |
| Average Median RTT (se | 6429 | 6550 |
| Post I&C (Aggregate) | | |
| Volume | 630000 | 667000 |
| Average Success % | 94% | 95% |
| Average Median RTT (se | 8 | 8 |
| Tariff Update | | |
| Volume | 53000 | 203000 |
| Average Success % | 91% | 66% |
| Average Median RTT (se | 4 | 17 |

| CSP South | Apr-21 | May-21 |
|---|----------|----------|
| Install & Commission (Aggregate) | | |
| Volume | 1095000 | 1100000 |
| Average Success % | 96% | 96% |
| Average RTT (seconds) | 10 | 10 |
| Change of Supply (Aggregate) | | |
| Volume | 453000 | 410000 |
| Average Success % | 87% | 85% |
| Average RTT (seconds) | 15 | 15 |
| Prepayment (Aggregate) | | |
| Volume | 765000 | 728000 |
| Average Success % | 89% | 90% |
| Average RTT (seconds) | 9 | 9 |
| Meter Reads (Aggregate) | | |
| Volume | 75616000 | 83156000 |
| Average Success % | 89% | 94% |
| Average RTT (seconds) | 6604 | 6819 |
| Post I&C (Aggregate) | | |
| Volume | 509000 | 545000 |
| Average Success % | 95% | 95% |
| Average RTT (seconds) | 8 | 9 |
| Tariff Update | | |
| Volume | 45000 | 162000 |
| Average Success % | 89% | 66% |
| Average RTT (seconds) | 4 | 17 |

Firmware Download and Activation



Device Firmware Transfer

| | CSP North | CSP Central | CSP South |
|----------|--------------|--------------|--------------|
| Attempts | 292734 | 476918 | 473298 |
| Success | 109975 (38%) | 364132 (76%) | 367551 (78%) |
| Failure | 3608 (1%) | 11047 (2%) | 12339 (3%) |
| No Alert | 179151 (61%) | 101739 (21%) | 93408 (20%) |

The table above shows the number of devices - ESME, GSME - that received SRV 11.1. Success is identified as those that resulted in Alert code 0x8F72 and Failure as those that resulted in Alert code 0x8F1C. No Alert shows devices that were sent the SRV but returned neither Alert.

Device Firmware Activation

| | CSP North | CSP Central | CSP South |
|----------|--------------|--------------|--------------|
| Attempts | 708751 | 731708 | 703984 |
| Success | 563227 (79%) | 556528 (76%) | 545228 (77%) |
| Failure | 145524 (21%) | 175180 (24%) | 158756 (23%) |

The table above shows the number of devices - ESME, GSME - that received firmware update SRV 11.3. Success is identified as those that resulted in a success response code (I0,I99) and Failure as those that resulted in non-success response code (E20,E21,E30).

- Considerable percentage of devices not generating the Firmware Verification Success or Failure alerts (8F72 or 8F1C). Particularly high percentage in CSP North region (61% missing alert)
 - This has been discussed at TSIRs, although has been considered not an issue with specifications. Potential malfunction in either the meter, the CH, the DSP or a combination thereof.
- Download volumes do not seem to be reflective of what is reported in the Performance Measurement Report (PMR)

Communications Hub Firmware Activation

| | CSP North | CSP Central | CSP South |
|----------|-------------|--------------|--------------|
| Attempts | 22987 | 203199 | 165004 |
| Success | 21963 (96%) | 202098 (99%) | 164038 (99%) |
| Failure | 1024 (4%) | 1101 (1%) | 966 (1%) |

DCC Overall Performance – May 2021



| | CSP North | CSP Central | CSP South | SMETS1 | All Regions (DCC) |
|--|------------------|-----------------|-----------------|------------------|-------------------------|
| Average RTT | 8785 sec | 11234 sec | 11026 sec | 12557 sec | 11186 sec |
| Median RTT | 28 sec | 9 sec | 9 sec | 94 sec | 11 sec |
| Range (Shortest) (Longest) | (0) (523733) sec | (0) (89992) sec | (0) (87952) sec | (0) (523938) sec | (0) (523938) sec |
| Percentage of SRs Delivered within TRT (%) | 99 | 99 | 99 | 100 | 99 |
| Volumes (attempts) | 19663K | 43949K | 32288K | 36711K | 132611K |
| SRs that failed to be delivered | 7% | 2% | 3% | 1% | 3% |
| Number of Unique SEC Parties | 72 parties | 70 parties | 71 parties | 52 parties | 81 parties |
| Unique CHF Manufacturer / Model / Firmware | 54 Combinations | 61 Combinations | 55 Combinations | 9 Combinations | 83 Combinations |

To give a proxy of DCC performance of the system, this table demonstrates the overall performance of SECMOD122A Business Process SRVs sent to CHF and GPF broken down by CSP Region.

Additionally, the table shows the number of SEC Parties that sent SRVs to the device types and also the number of CHF / Meter Combinations. Combinations consist of CHF make, model & firmware and Meter make, model & firmware.



Performance Indicator Reporting

Install & Commission

1. SRV8.11 – Update HAN Device Log
2. SRV6.21 – Request Handover of DCC Controlled Device
3. SRV8.1.1 – Commission Device
4. SRV6.20.1 – Set Device Configuration MPxN
5. SRV1.1.1 – Update Import Tariff
6. SRV6.8 – Update Billing Calendar
7. SRV8.14.1 – Comms Hub Status Update

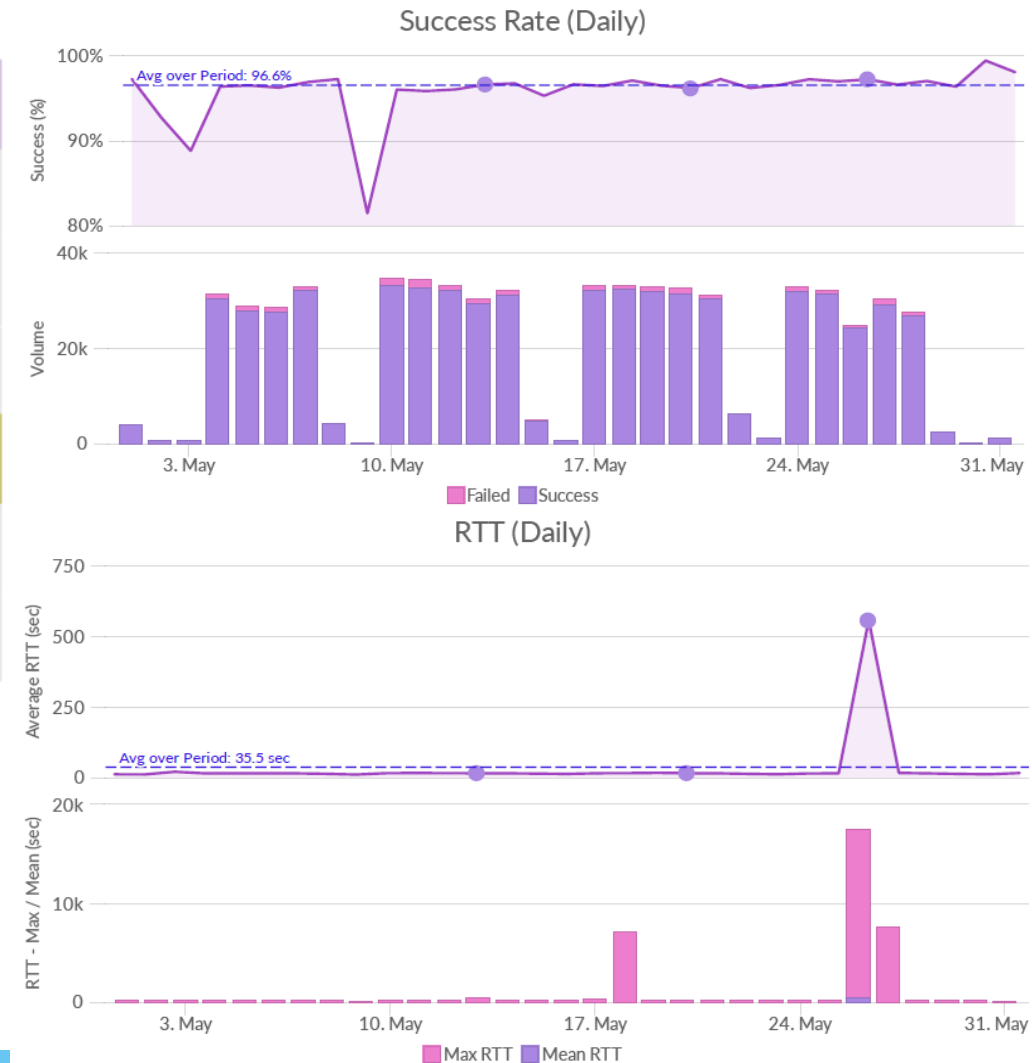
Install & Commission – SRV8.11 Update HAN Device Log

Summary

| | CSP North | CSP Central | CSP South |
|--|-----------------|-----------------|-----------------|
| Average RTT | 54 sec | 28 sec | 28 sec |
| Median RTT | 16 sec | 4 sec | 4 sec |
| Range (Shortest) (Longest) | (2) (16991) sec | (1) (17615) sec | (1) (17199) sec |
| Percentage of SRs Delivered within TRT (%) | 68 | 96 | 95 |
| Volumes (attempts) | 183k | 246k | 200k |
| Service Requests that failed to be delivered | 6% | 2% | 3% |

Observations

- Average Successful responses in period across SEC parties was 96.6% (CSP N 94.4%, CSP C 97.8% and CSP S 97.2%)
- SRV8.11 is targeted to the CHF and therefore should be representative of DCC performance



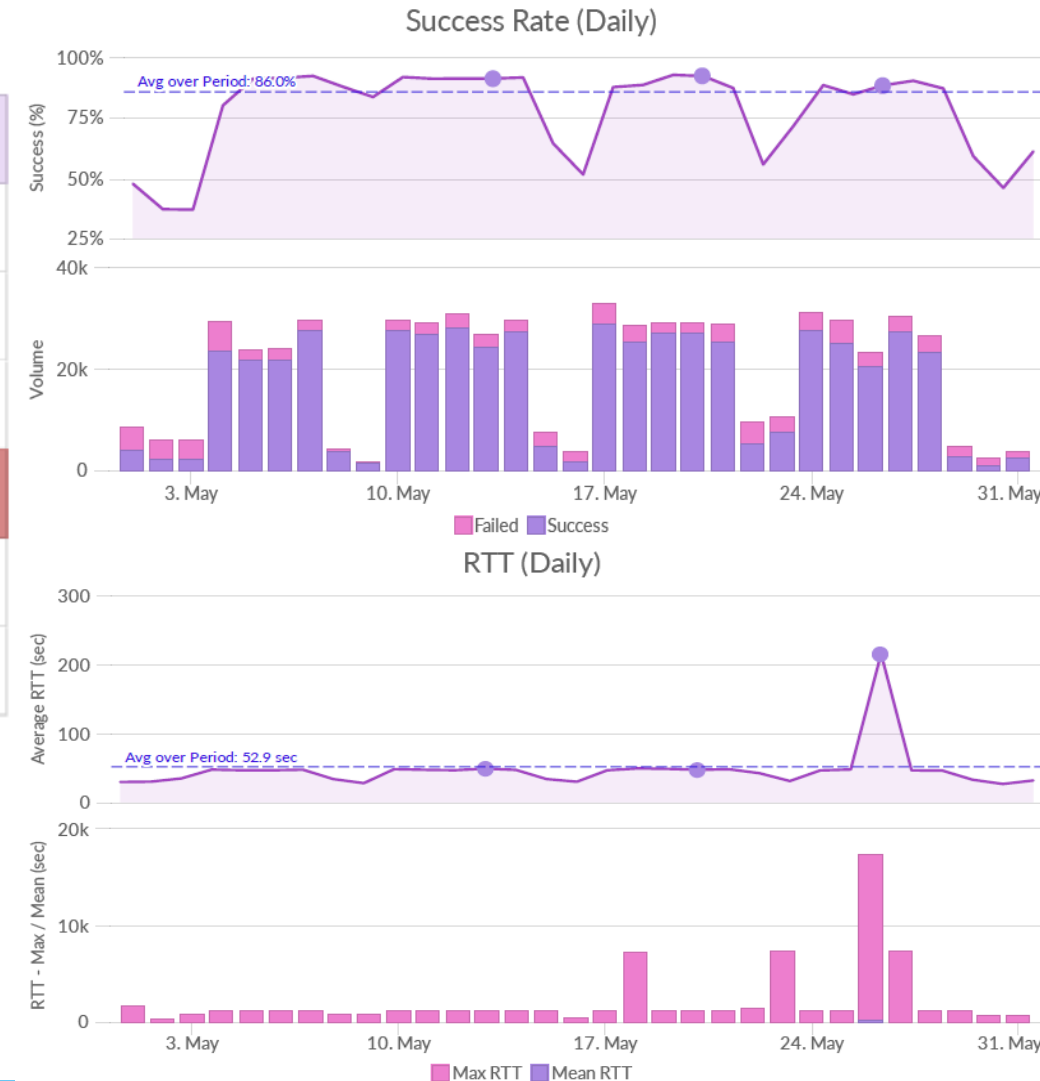
Install & Commission – SRV6.21 Request Handover of DCC Controlled Device

Summary

| | CSP North | CSP Central | CSP South |
|--|-----------------|-----------------|-----------------|
| Average RTT | 95 sec | 36 sec | 34 sec |
| Median RTT | 66 sec | 18 sec | 18 sec |
| Range (Shortest) (Longest) | (7) (14251) sec | (6) (17428) sec | (6) (16867) sec |
| Percentage of SRs Delivered within TRT (%) | 2 | 85 | 87 |
| Volumes (attempts) | 188k | 242k | 185k |
| Service Requests that failed to be delivered | 18% | 12% | 12% |

Observations

- Average Successful responses in period across SEC parties was 86%
- ESME Success between 76-82% across SMETS2 regions
- GSME Success between 70-74% across SMETS2 regions
- Success against GPFs across the regions between 90%-98% average for period



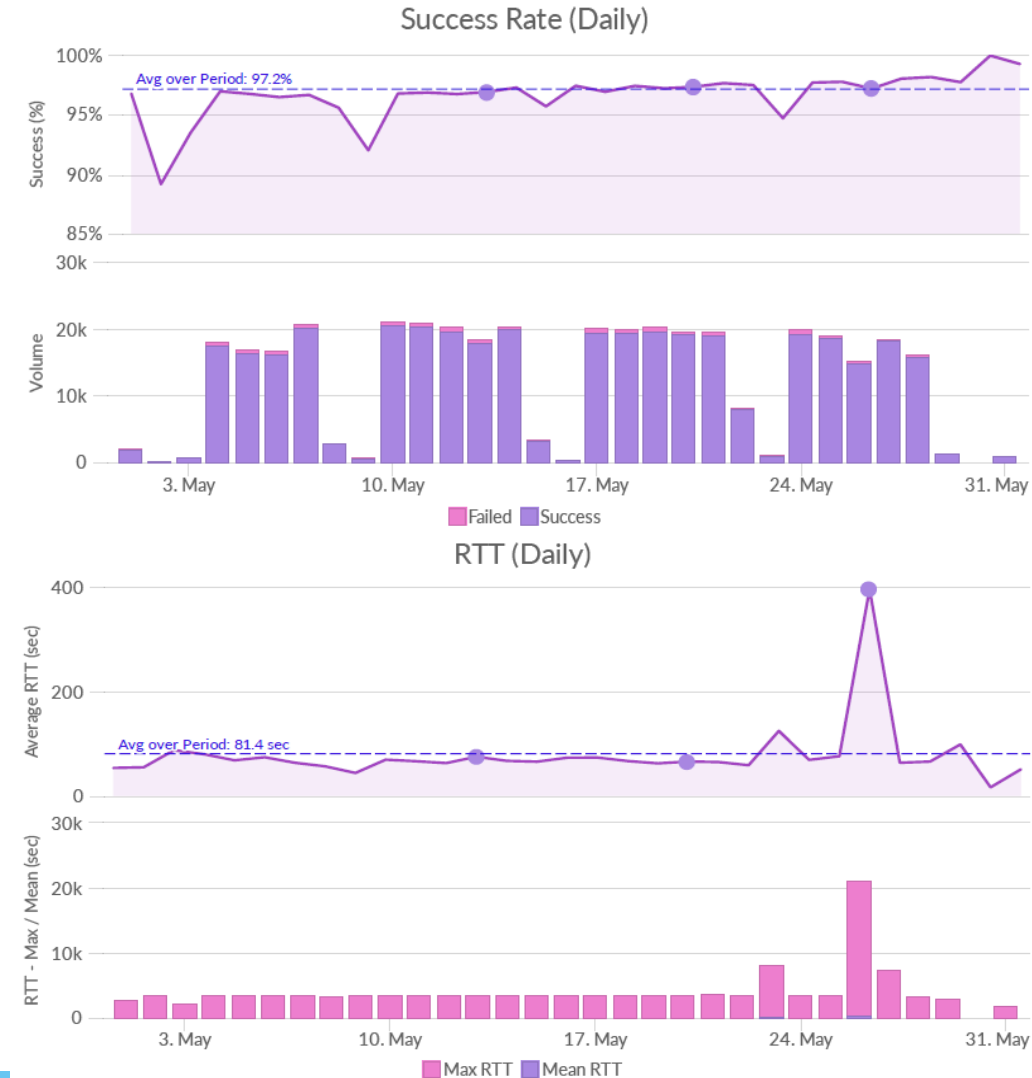
Install & Commission – SRV8.1.1 Commission Device

Summary

| | CSP North | CSP Central | CSP South |
|--|-----------------|-----------------|-----------------|
| Average RTT | 138 sec | 64 sec | 58 sec |
| Median RTT | 59 sec | 10 sec | 11 sec |
| Range (Shortest) (Longest) | (2) (18007) sec | (2) (16330) sec | (2) (21289) sec |
| Percentage of SRs Delivered within TRT (%) | 25 | 84 | 82 |
| Volumes (attempts) | 102k | 155k | 128k |
| Service Requests that failed to be delivered | 4% | 2% | 3% |

Observations

- Average Success in period across SEC parties was 97.2%
- ESME success between 95-98% across SMETS2 regions
- GSME success between 97% across SMETS2 regions



Install & Commission – SRV6.20.1 Set Device Configuration MPxN

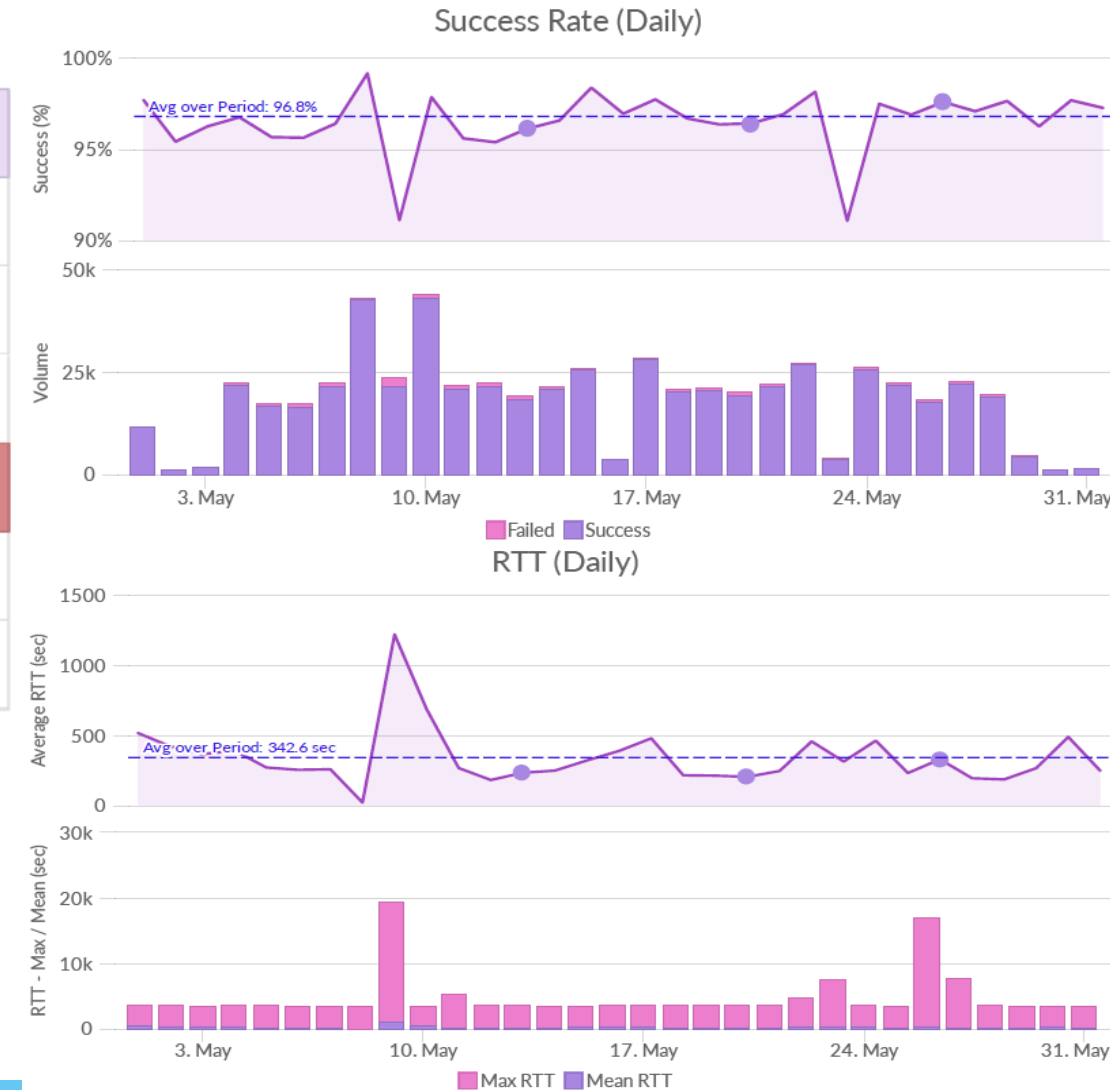


Summary

| | CSP North | CSP Central | CSP South |
|--|-----------------|-----------------|-----------------|
| Average RTT | 305 sec | 368 sec | 334 sec |
| Median RTT | 22 sec | 5 sec | 5 sec |
| Range (Shortest) (Longest) | (1) (16801) sec | (1) (16887) sec | (1) (19416) sec |
| Percentage of SRs Delivered within TRT (%) | 62 | 70 | 70 |
| Volumes (attempts) | 141k | 264k | 180k |
| Service Requests that failed to be delivered | 4% | 2% | 3% |

Observations

- Average success in period across SEC parties was 96.8%
- ESME success between 97-98% across SMETS2 regions
- GSME success between 93-96% across SMETS2 regions



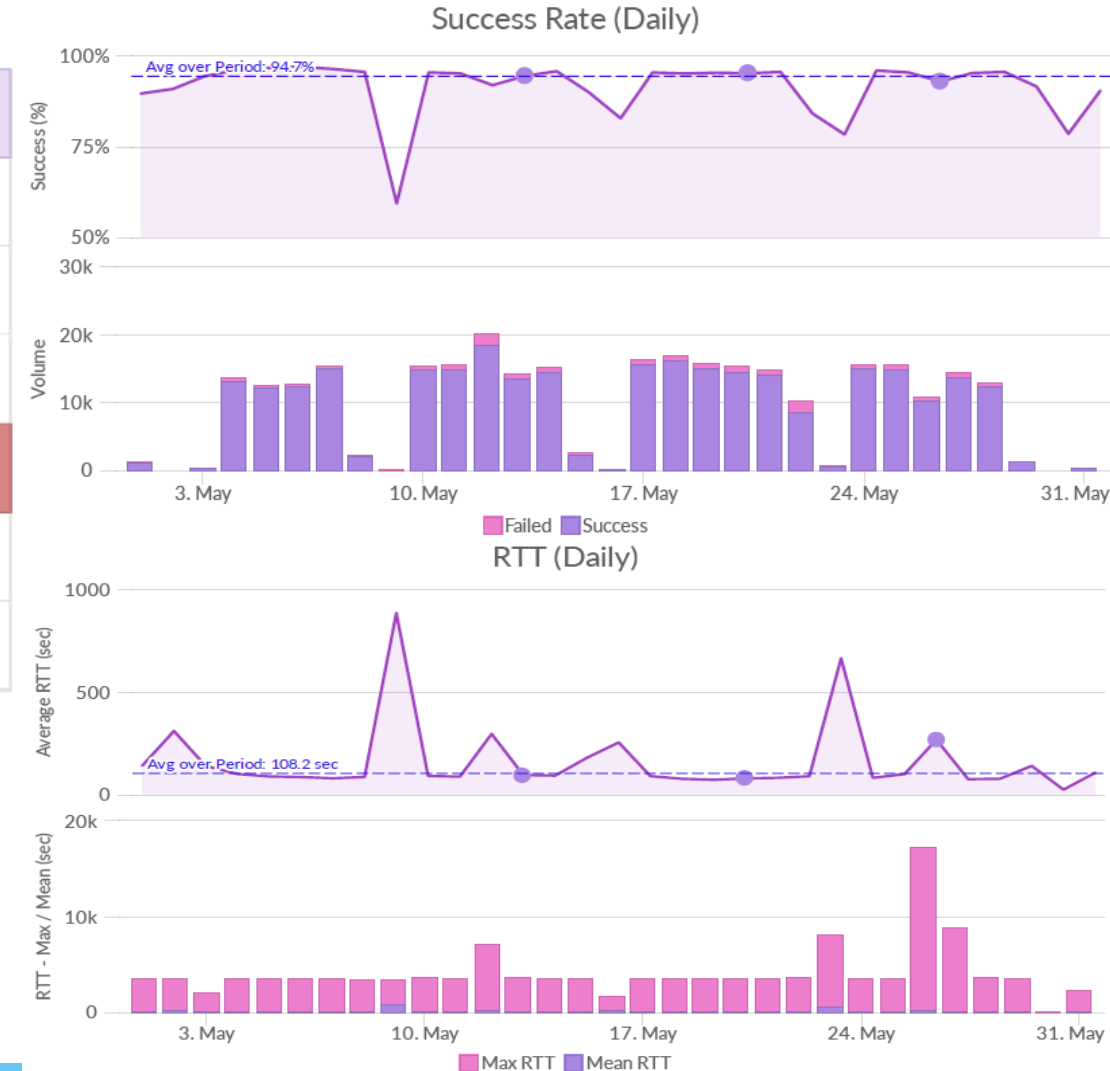
Install & Commission – SRV8.7.2 Join Service (GPF)

Summary

| | CSP North | CSP Central | CSP South |
|--|----------------|----------------|----------------|
| Average RTT | 127 sec | 99 sec | 102 sec |
| Median RTT | 50 sec | 18 sec | 18 sec |
| Range (Shortest) (Longest) | (1)(17359) sec | (1)(17292) sec | (1)(14288) sec |
| Percentage of SRs Delivered within TRT (%) | 46 | 69 | 68 |
| Volumes (attempts) | 91k | 122k | 92k |
| Service Requests that failed to be delivered | 8% | 4% | 4% |

Observations

- Average success in period across SEC parties was 94.7%
- GSME/GPF success between 89-97% across SMETS2 regions



Install & Commission – SRV1.1.1 Update Import Tariff

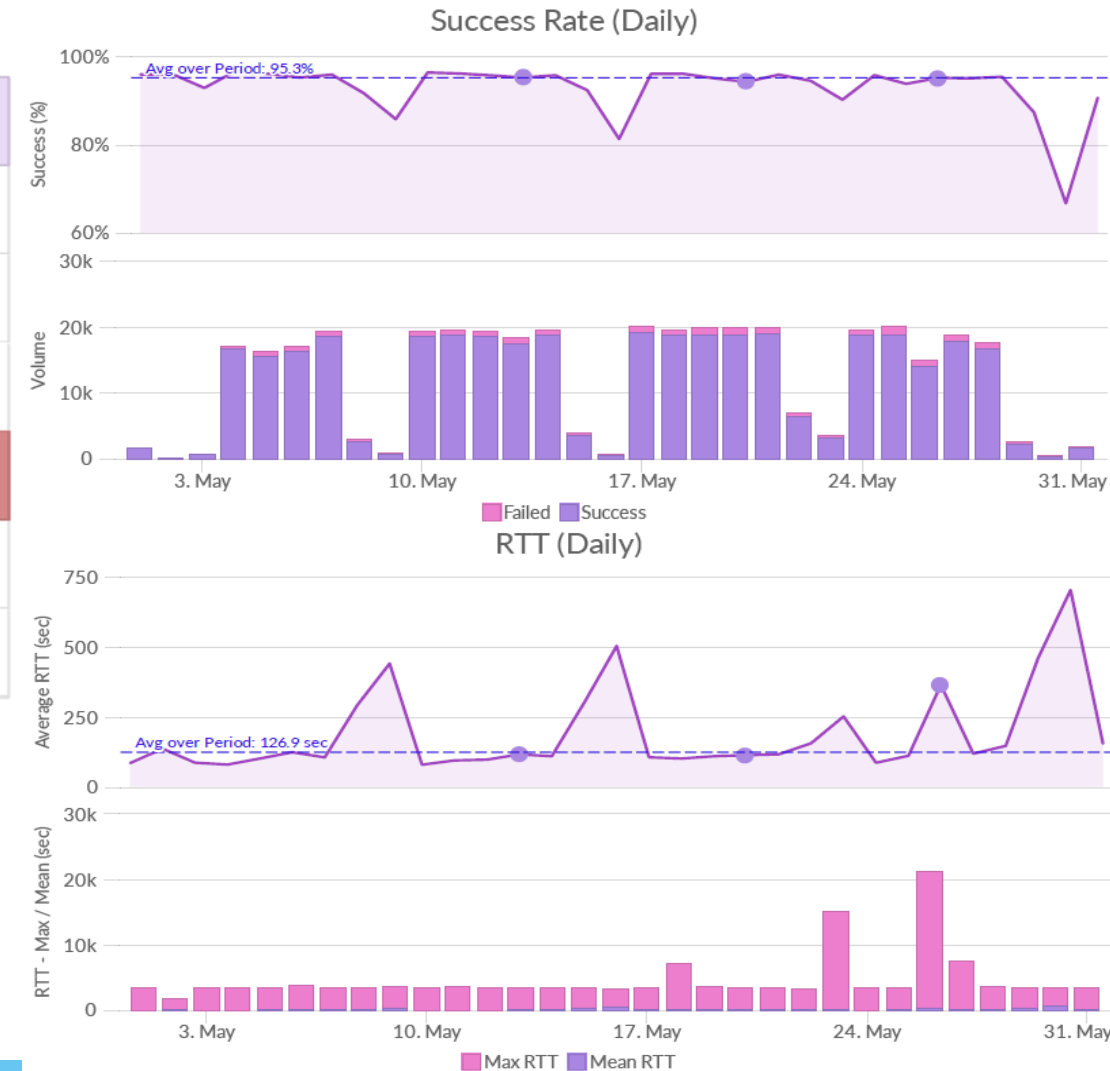


Summary

| | CSP North | CSP Central | CSP South |
|--|-----------------|-----------------|-----------------|
| Average RTT | 172 sec | 106 sec | 115 sec |
| Median RTT | 65 sec | 17 sec | 18 sec |
| Range (Shortest) (Longest) | (7) (17338) sec | (6) (21363) sec | (5) (20935) sec |
| Percentage of SRs Delivered within TRT (%) | 10 | 77 | 73 |
| Volumes (attempts) | 106k | 154k | 126k |
| Service Requests that failed to be delivered | 6% | 4% | 5% |

Observations

- Average success in period across SEC parties was 95.3%
- ESME success approx. 95% across SMETS2 regions
- GSME success between 92-96% across SMETS2 regions



Install & Commission – SRV6.8 Update Billing Calendar

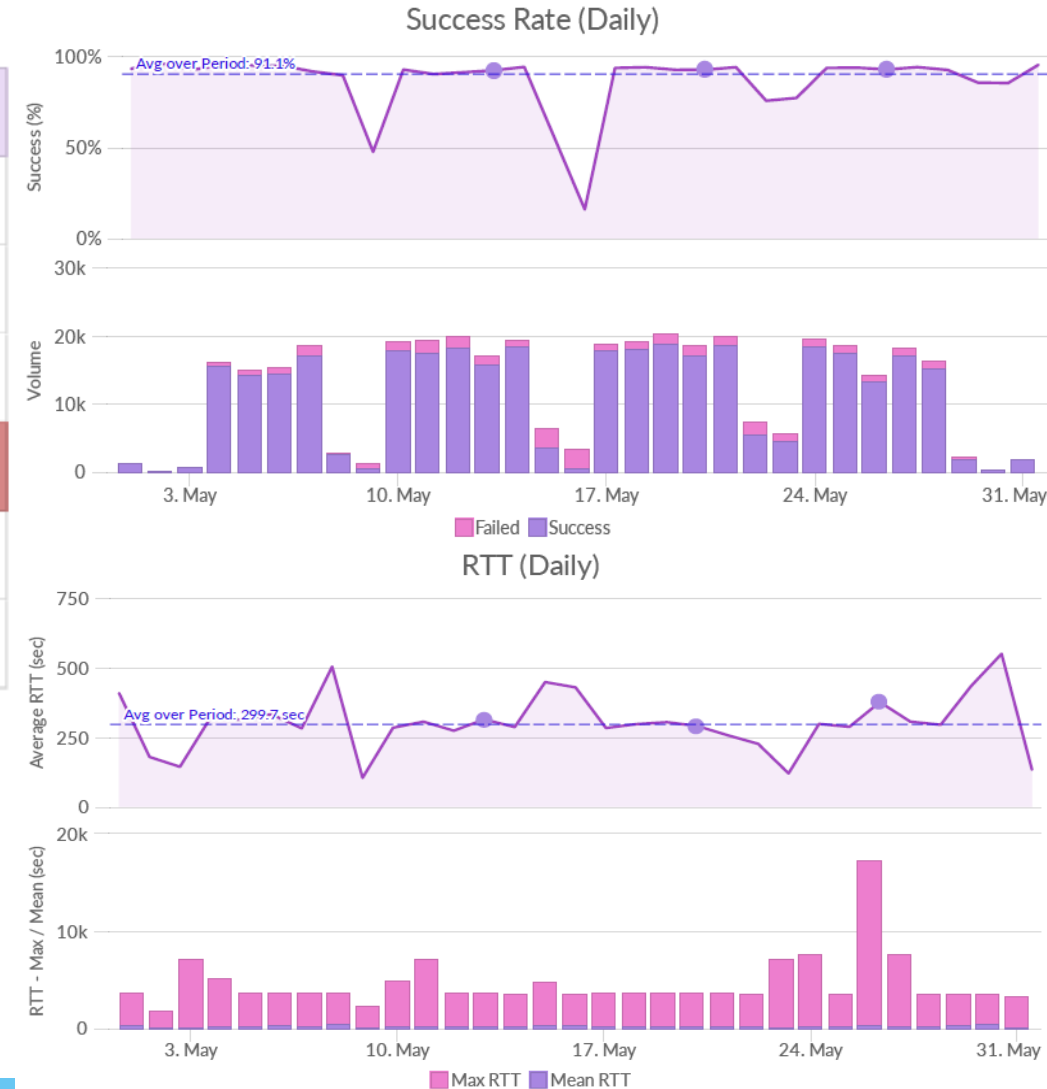


Summary

| | CSP North | CSP Central | CSP South |
|--|-----------------|-----------------|-----------------|
| Average RTT | 340 sec | 291 sec | 278 sec |
| Median RTT | 33 sec | 8 sec | 9 sec |
| Range (Shortest) (Longest) | (3) (14191) sec | (2) (17381) sec | (2) (14322) sec |
| Percentage of SRs Delivered within TRT (%) | 52 | 71 | 71 |
| Volumes (attempts) | 115k | 146k | 119k |
| Service Requests that failed to be delivered | 19% | 4% | 5% |

- Average success in period across SEC parties was 91%
- ESME success approx. 94-97% across SMETS2 regions
- GSME success between 66-93% across SMETS2 regions

One SEC party that sent over 15k to GSMEs within the period had an average success rate of under 10%, contributing to a CSP North average success for period on GSMEs to be 66.9%



Install & Commission – SRV8.14.1 Comms Hub Status Update

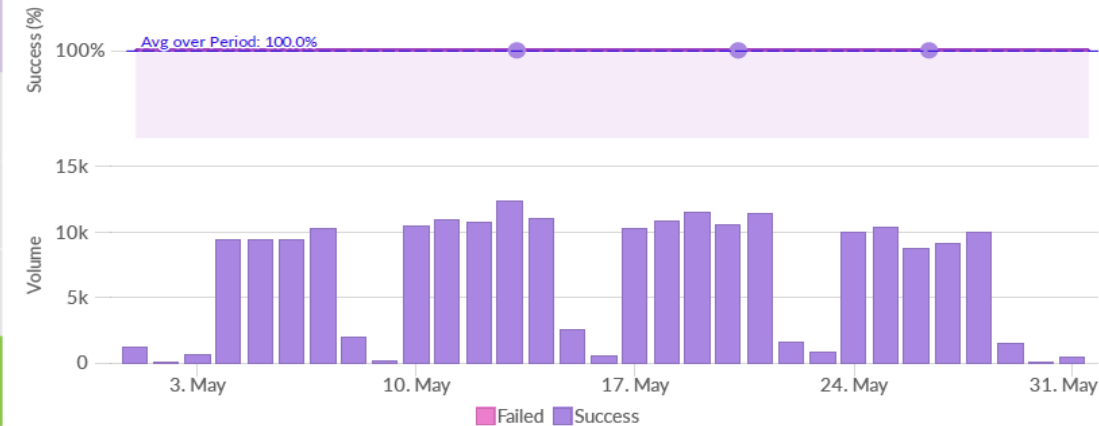
Summary

| | CSP North | CSP Central | CSP South |
|--|---------------|---------------|---------------|
| Average RTT | 1 sec | 0 sec | 0 sec |
| Median RTT | 1 sec | 0 sec | 0 sec |
| Range (Shortest) (Longest) | (0) (141) sec | (0) (156) sec | (0) (168) sec |
| Percentage of SRs Delivered within TRT (%) | 100 | 100 | 100 |
| Volumes (attempts) | 56k | 83k | 70k |
| Service Requests that failed to be delivered | 0% | 0% | 0% |

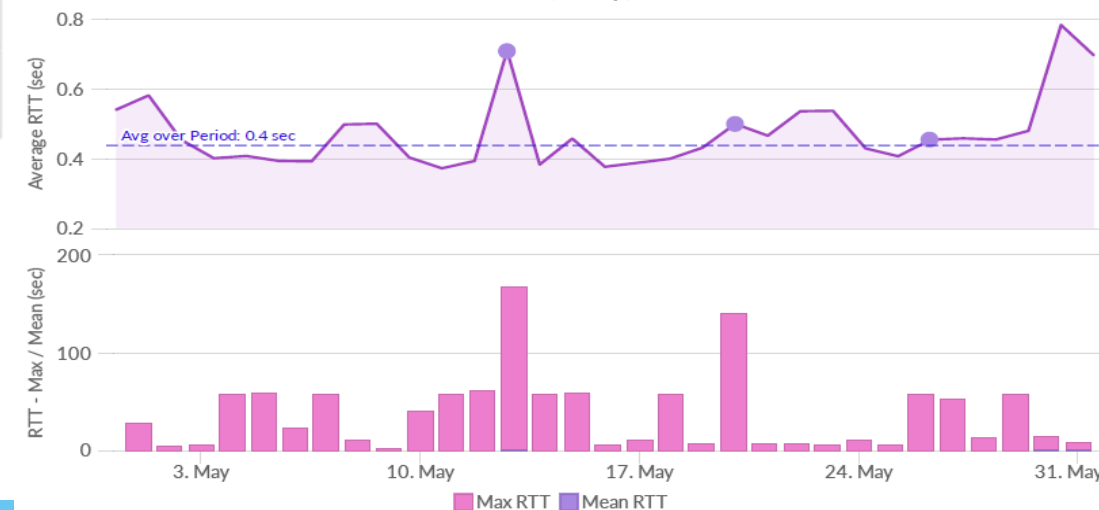
- Success rates across the regions and devices approx. 100%.

RTT increase correlates with DCC Only SRV Incidents on 21 & 22 April (INC000000717646 & INC000000718178)

Success Rate (Daily)



RTT (Daily)



Install & Leave: Trend Analysis*



| Region | April 2021 | | May 2021 | | June 2021 | | July 2021 | | August 2021 | | September 2021 | |
|-------------|------------|------|----------|------|-----------|------|-----------|------|-------------|------|----------------|------|
| | ESME | GSME | ESME | GSME | ESME | GSME | ESME | GSME | ESME | GSME | ESME | GSME |
| CSP North | 115 | 37 | 91 | 43 | | | | | | | | |
| CSP Central | 78 | 15 | 105 | 40 | | | | | | | | |
| CSP South | 55 | 14 | 56 | 8 | | | | | | | | |
| Total | 314 | | 343 | | | | | | | | | |

*Figures are representative of 8.14.2's (CH Status Update – No SM WAN) sent by Service Users



Performance Indicator Reporting

Change of Supplier (Gain)

1. SRV6.23 – Update Security Credentials (CoS)
2. SRV1.1.1 – Update Import Tariff

Change of Supplier – SRV6.23 Update Security Credentials (CoS)

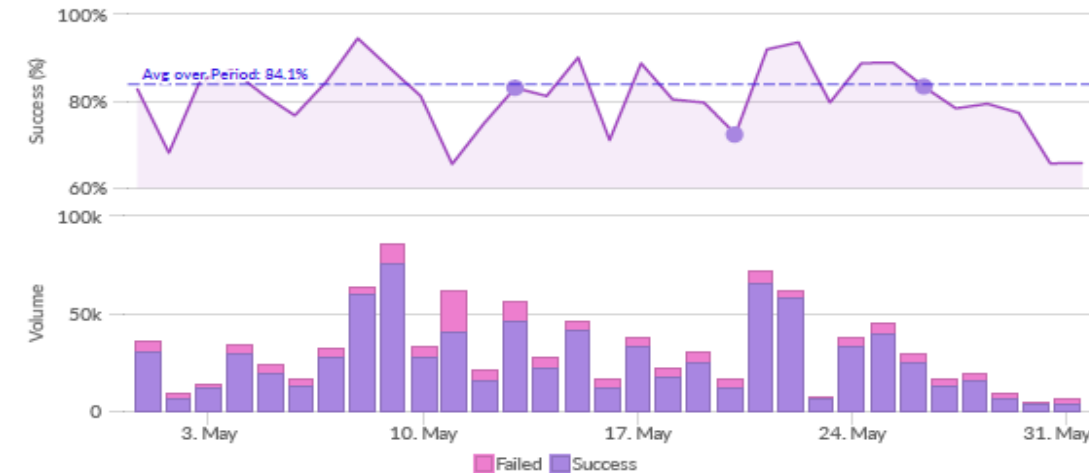
Summary

| | CSP North | CSP Central | CSP South | SMETS1 |
|--|-----------------|-----------------|-----------------|-----------------|
| Average RTT | 440 sec | 370 sec | 396 sec | 8 sec |
| Median RTT | 69 sec | 22 sec | 22 sec | 1 sec |
| Range (Shortest) (Longest) | (9) (14197) sec | (6) (19642) sec | (7) (19795) sec | (0) (22116) sec |
| Percentage of SRs Delivered within TRT (%) | 0 | 66 | 60 | 100 |
| Volumes (attempts) | 140k | 292k | 182k | 385k |
| Service Requests that failed to be delivered | 35% | 21% | 25% | 1% |

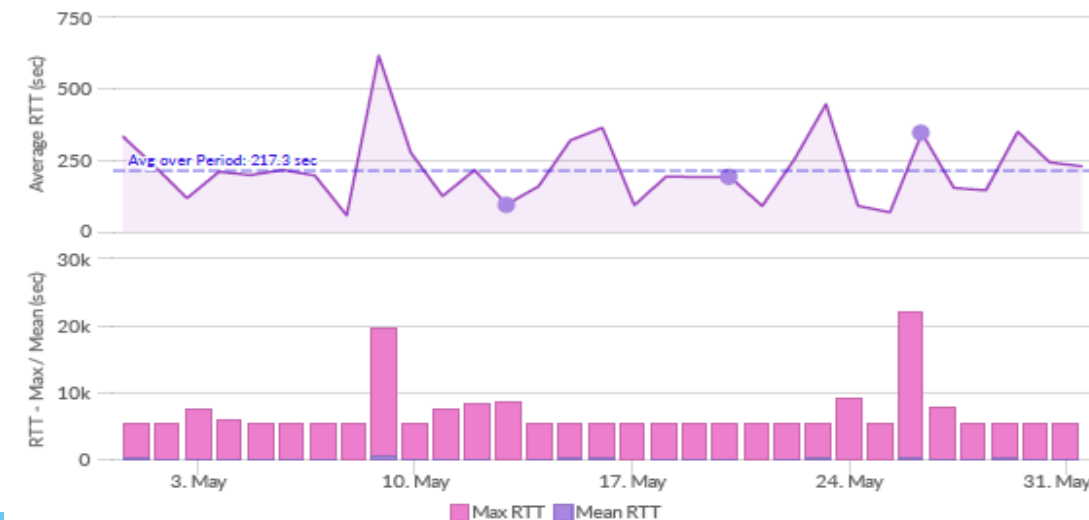
Observations

- Average success in period across SEC parties was 84.1%
- ESME success between 59-72% across SMETS2 regions. With SMETS1 on 98.7%
- GSME success between 53-64% across SMETS2 regions. With SMETS1 on 98.2%
- Success against GPFs across the regions between 94%-97% average for period

Success Rate (Daily)



RTT (Daily)



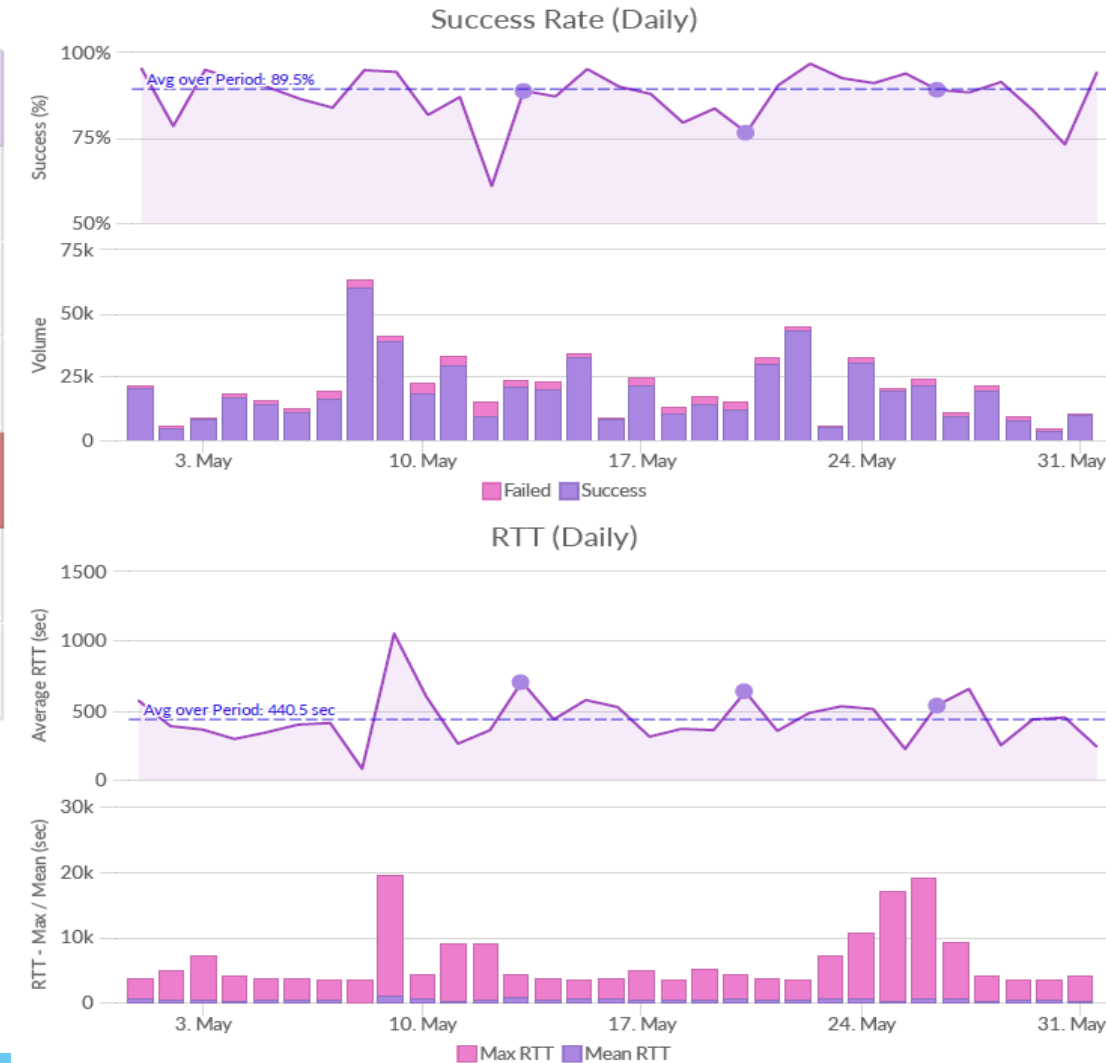
Change of Supplier – SRV1.1.1 Update Import Tariff

Summary

| | CSP North | CSP Central | CSP South | SMETS1 |
|--|------------------|-----------------|-----------------|-----------------|
| Average RTT | 496 sec | 547 sec | 565 sec | 285 sec |
| Median RTT | 56 sec | 16 sec | 17 sec | 46 sec |
| Range (Shortest) (Longest) | (10) (18852) sec | (5) (19527) sec | (6) (19477) sec | (0) (19124) sec |
| Percentage of SRs Delivered within TRT (%) | 7 | 61 | 58 | 5 |
| Volumes (attempts) | 82k | 210k | 126k | 239k |
| Service Requests that failed to be delivered | 18% | 14% | 15% | 2% |

Observations

- Average success in period across SEC parties was 89.5% (across all regions)
- ESME success between 81-84% across SMETS2 regions. With SMETS1 on 97.9%
- GSME success approx. 82-88% across SMETS2 regions. With SMETS1 on 98.1%





Performance Indicator Reporting

Prepayment

1. SRV1.6 – Update Payment Mode
2. SRV2.2 – Top-Up Device

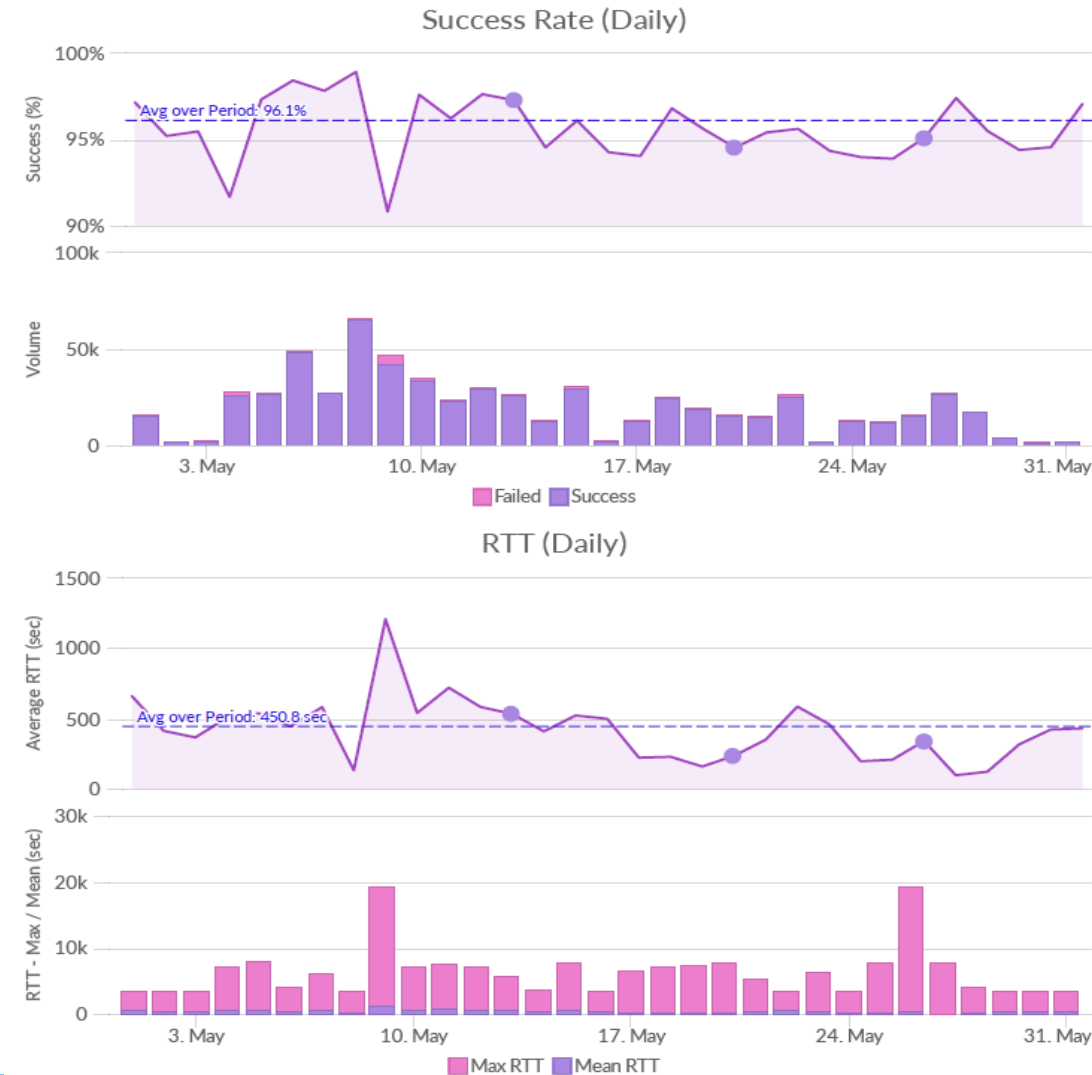
Prepayment – SRV1.6 Update Payment Mode

Summary

| | CSP North | CSP Central | CSP South | SMETS1 |
|--|-----------------|-----------------|-----------------|-----------------|
| Average RTT | 344 sec | 369 sec | 370 sec | 600 sec |
| Median RTT | 30 sec | 8 sec | 8 sec | 34 sec |
| Range (Shortest) (Longest) | (3) (16976) sec | (2) (19346) sec | (2) (19301) sec | (1) (16538) sec |
| Percentage of SRs Delivered within TRT (%) | 49 | 68 | 66 | 20 |
| Volumes (attempts) | 97k | 199k | 116k | 230k |
| Service Requests that failed to be delivered | 8% | 5% | 5% | 1% |

Observations

- Average success in period across SEC parties was 96.1% (across all regions)
- ESME success between 92-97% across SMETS2 regions. With SMETS1 on 98.5%
- GSME success approx. 91-92% across SMETS2 regions. With SMETS1 on 99.6%



Prepayment – SRV2.2 Top Up Device

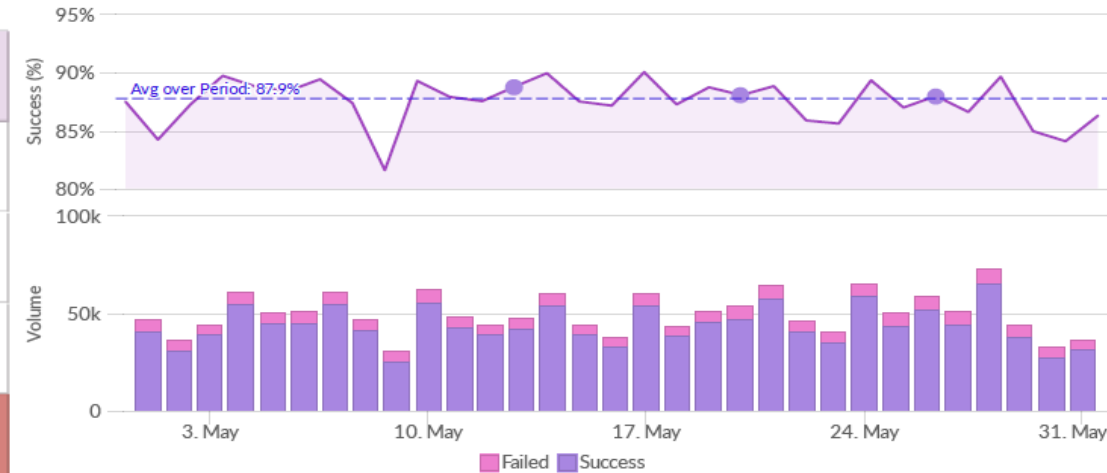
Summary

| | CSP North | CSP Central | CSP South | SMETS1 |
|--|-----------------|-----------------|-----------------|-----------------|
| Average RTT | 371 sec | 350 sec | 278 sec | 67 sec |
| Median RTT | 13 sec | 6 sec | 6 sec | 28 sec |
| Range (Shortest) (Longest) | (1) (15373) sec | (1) (17456) sec | (1) (17248) sec | (4) (14237) sec |
| Percentage of SRs Delivered within TRT (%) | 63 | 67 | 74 | 74 |
| Volumes (attempts) | 174k | 722k | 578k | 78k |
| Service Requests that failed to be delivered | 12% | 11% | 16% | 0% |

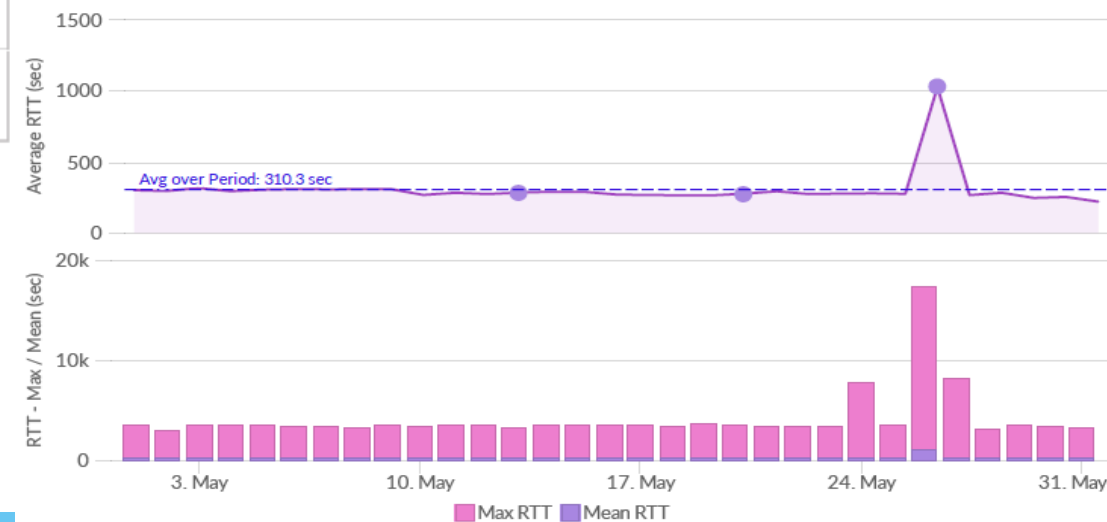
Observations

- Average success in period across SEC parties was 87.9% (across all regions)
- ESME success between 89-93% across SMETS2 regions. With SMETS1 on 99.6%
- GSME success approx. 71-83% across SMETS2 regions. With SMETS1 on 99.6%

Success Rate (Daily)



RTT (Daily)





Performance Indicator Reporting

Meter Reads

1. SRV4.6.1 – Retrieve Import Daily Read Log
2. SRV4.8.1 – Read Active Import Profile Data (HH)
3. SRV4.10 – Read Network Data
4. SRV4.17 – Retrieve Daily Consumption Log

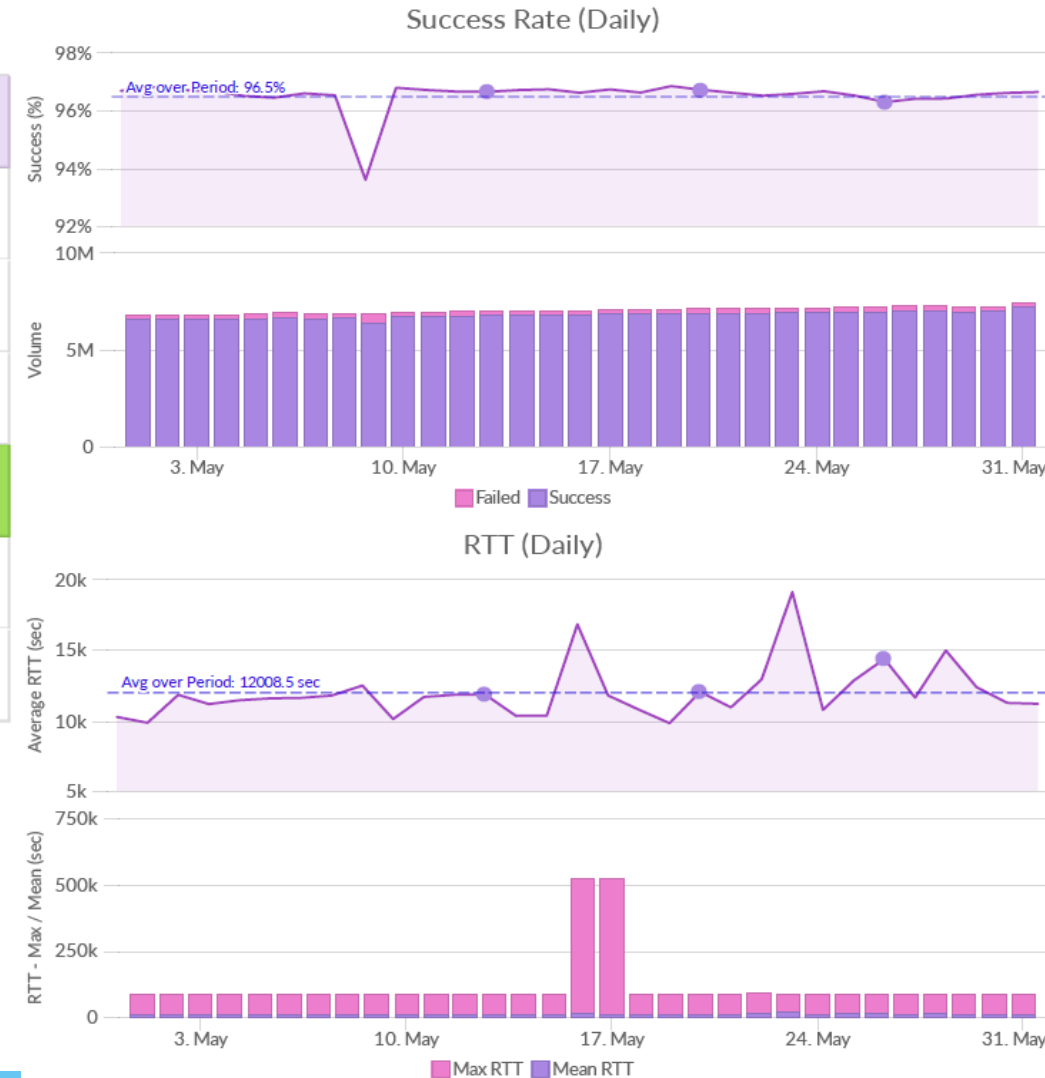
Meter Reads - SRV4.6.1 Retrieve Import Daily Read Log

Summary

| | CSP North | CSP Central | CSP South | SMETS1 |
|--|------------------|-----------------|-----------------|------------------|
| Average RTT | 9551 sec | 11861 sec | 11713 sec | 13407 sec |
| Median RTT | 8777 sec | 10485 sec | 10626 sec | 5214 sec |
| Range (Shortest) (Longest) | (3) (523733) sec | (2) (89992) sec | (3) (87596) sec | (4) (524027) sec |
| Percentage of SRs Delivered within TRT (%) | 100 | 100 | 100 | 100 |
| Volumes (attempts) | 31842k | 66470k | 52174k | 69402k |
| Service Requests that failed to be delivered | 8% | 3% | 4% | 1% |

Observations

- Average success in period across SEC parties was 96.5% (across all regions)
- ESME success between 90-96% across SMETS2 regions. With SMETS1 on 98.7%
- GPF success approx. 92-97% across SMETS2 regions. With SMETS1 on 99%



Meter Reads - SRV4.6.2 Retrieve Export Daily Read Log

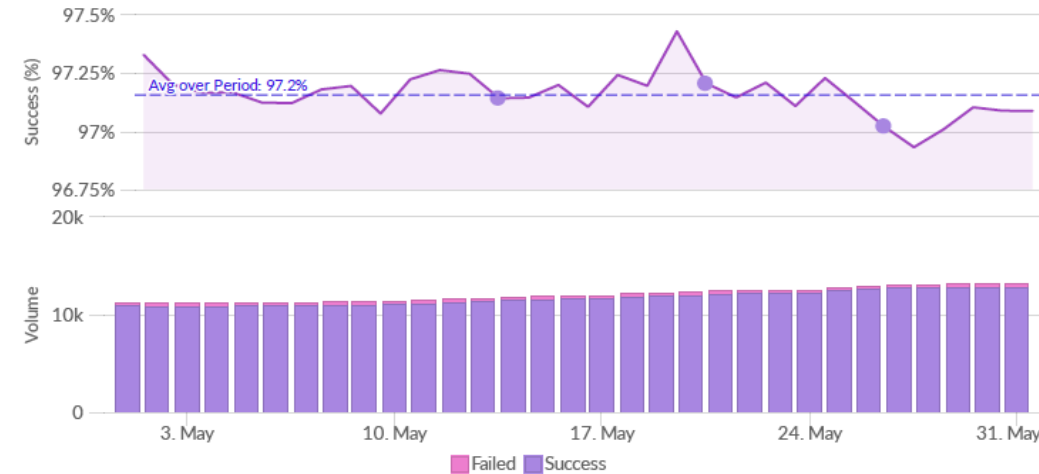
Summary

| | CSP North | CSP Central | CSP South |
|--|-----------------|-----------------|-----------------|
| Average RTT | 9322 sec | 11752 sec | 11862 sec |
| Median RTT | 9143 sec | 10696 sec | 10964 sec |
| Range (Shortest) (Longest) | (7) (85333) sec | (3) (83997) sec | (3) (85969) sec |
| Percentage of SRs Delivered within TRT (%) | 100 | 100 | 100 |
| Volumes (attempts) | 64k | 149k | 161k |
| Service Requests that failed to be delivered | 6% | 2% | 3% |

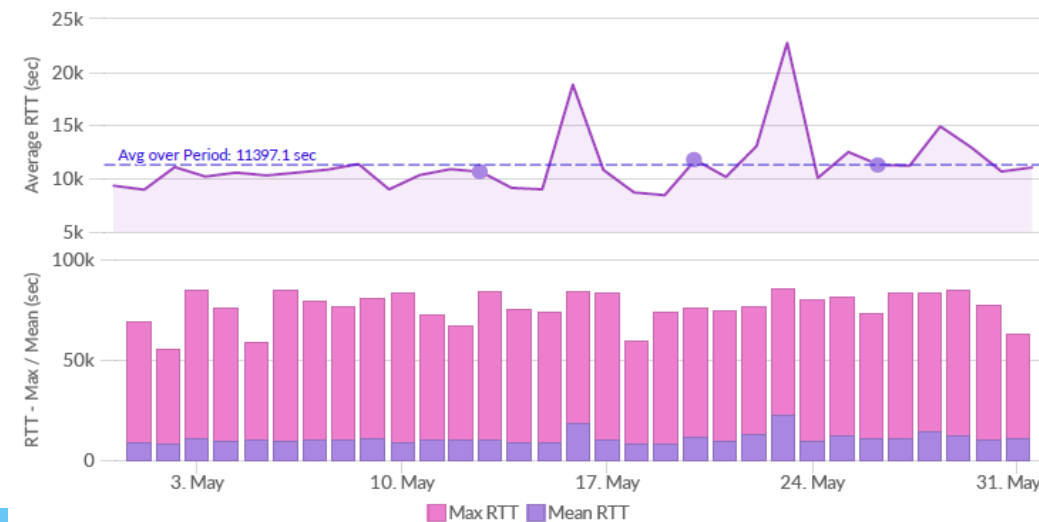
Observations

- Average success in period across SEC parties was 97.2% (across all regions)
- ESME success between 94-98% across SMETS2 regions
- Large percentage of Export Read (SR4.6.2) volume attributed to one SEC Party (over 90%)

Success Rate (Daily)



RTT (Daily)



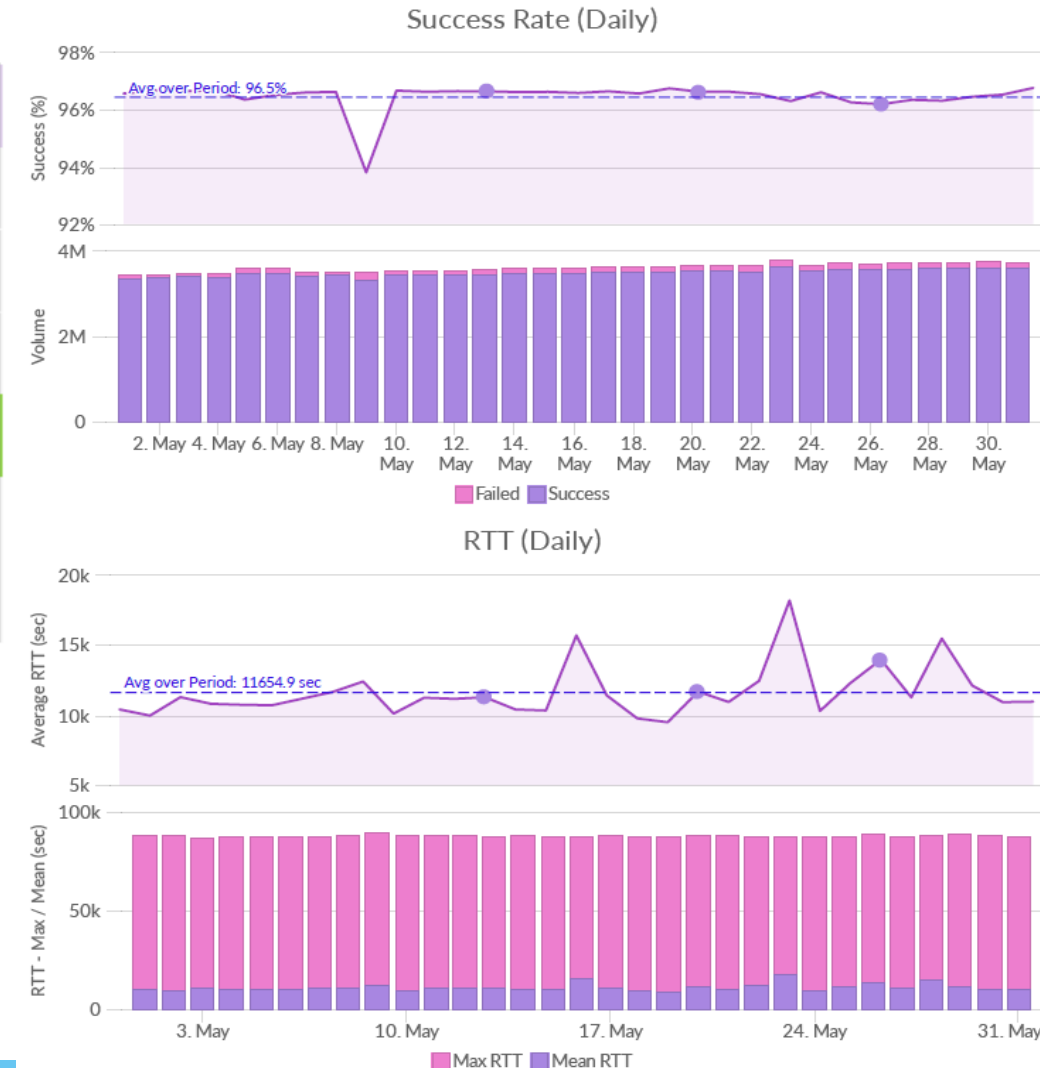
Meter Reads - SRV4.8.1 Read Active Import Profile Data (HH)

Summary

| | CSP North | CSP Central | CSP South | SMETS1 |
|--|-----------------|-----------------|-----------------|-----------------|
| Average RTT | 9666 sec | 12140 sec | 11751 sec | 11963 sec |
| Median RTT | 9189 sec | 10673 sec | 10768 sec | 5783 sec |
| Range (Shortest) (Longest) | (0) (88554) sec | (0) (88227) sec | (0) (87952) sec | (3) (89980) sec |
| Percentage of SRs Delivered within TRT (%) | 100 | 100 | 100 | 100 |
| Volumes (attempts) | 16079k | 35886k | 29124k | 31847k |
| Service Requests that failed to be delivered | 9% | 3% | 4% | 1% |

Observations

- Average success in period across SEC parties was 96.5% (across all regions)
- ESME success between 90-96% across SMETS2 regions. With SMETS1 on 98.9%
- GPF success approx. 92-97% across SMETS2 regions. With SMETS1 on 99.2%



Meter Reads - SRV4.10 Read Network Data



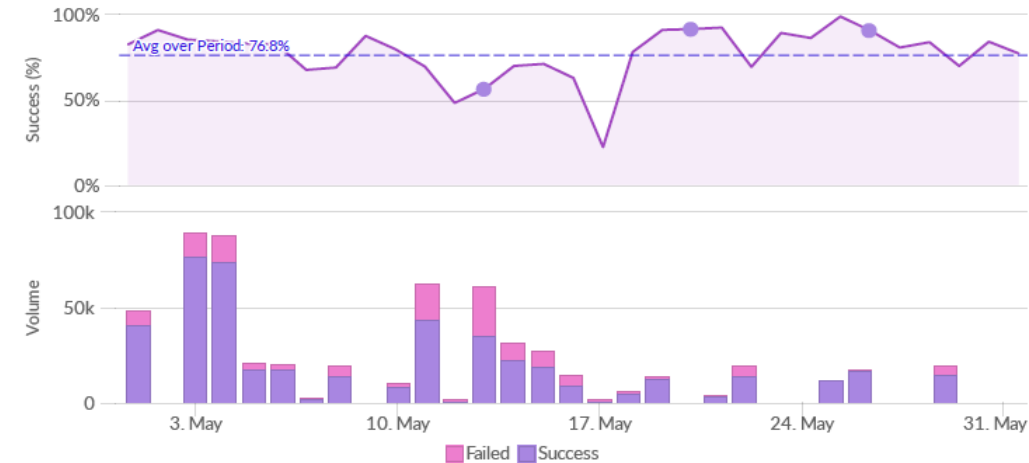
Summary

| | CSP North | CSP Central | CSP South | SMETS1 |
|--|----------------|-----------------|---------------|----------------|
| Average RTT | 325 sec | 91 sec | 25 sec | 114 sec |
| Median RTT | 150 sec | 80 sec | 24 sec | 89 sec |
| Range (Shortest) (Longest) | (4) (8577) sec | (4) (14818) sec | (7) (323) sec | (5) (7465) sec |
| Percentage of SRs Delivered within TRT (%) | 9 | 0 | 88 | 0 |
| Volumes (attempts) | 254k | 247k | 3k | 92k |
| Service Requests that failed to be delivered | 40% | 15% | 8% | 0% |

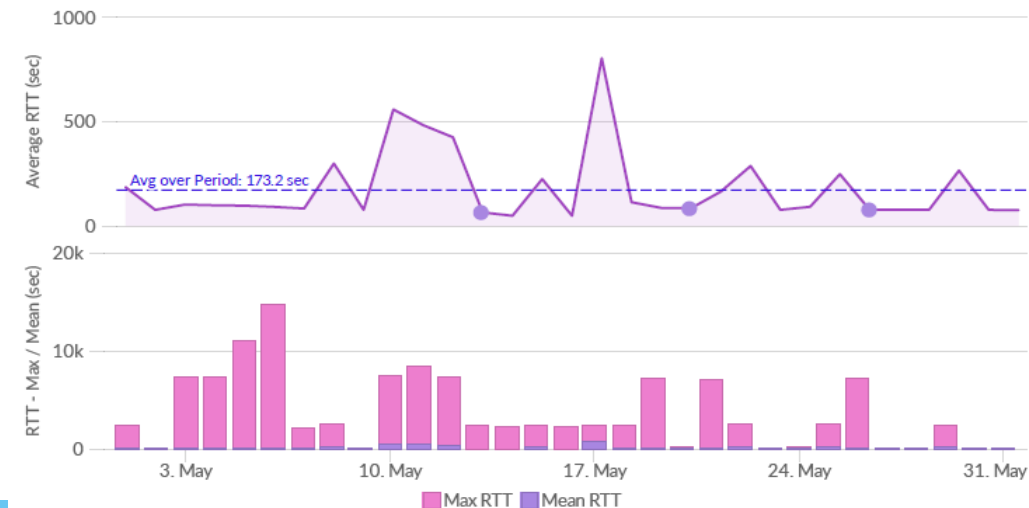
Observations

- Average success in period across SEC parties was 76.8% (across all regions)
- ESME success ranges between 60.2% in CSP North to 85.2% in CSP South and 91.9% in CSP Central. With SMETS1 on 99.8%

Success Rate (Daily)



RTT (Daily)



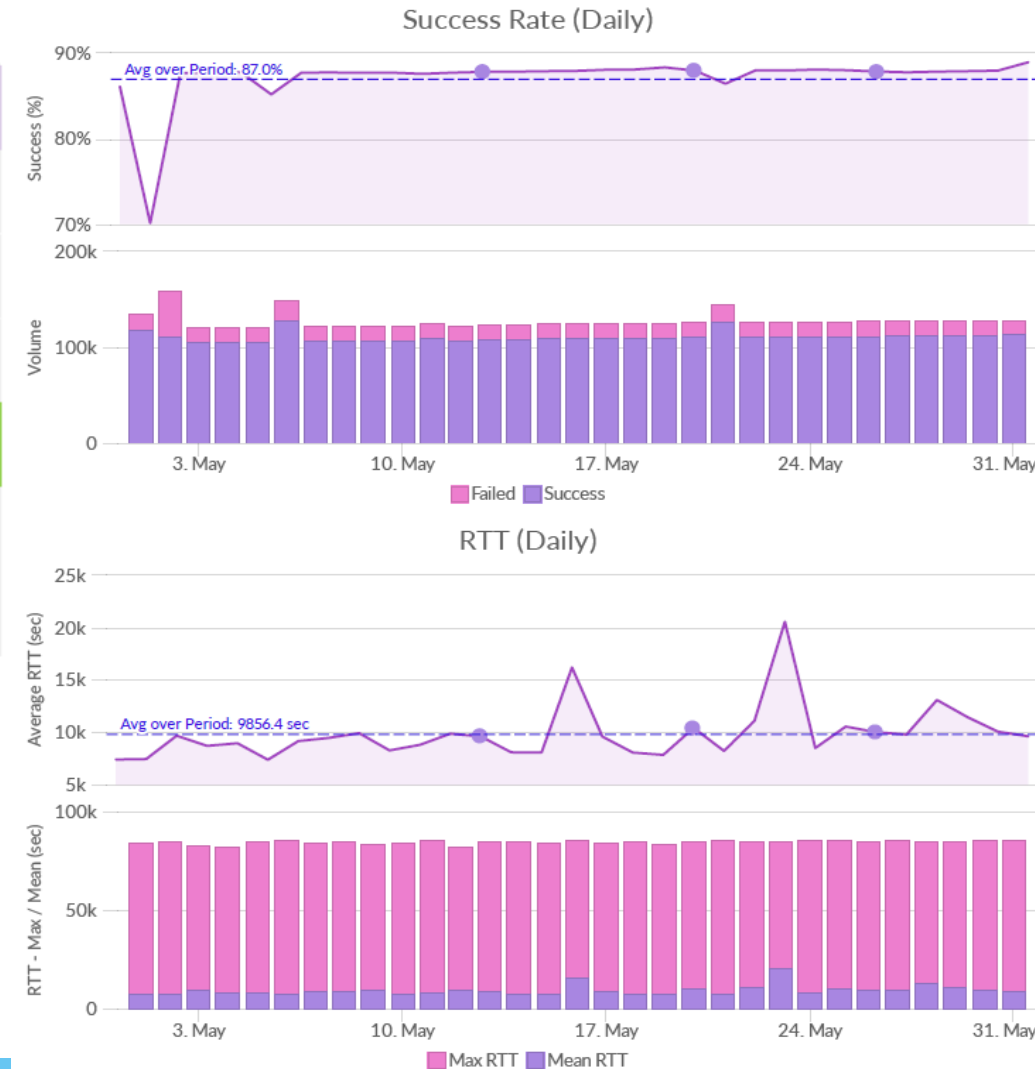
Meter Reads - SRV4.17 Retrieve Daily Consumption Log

Summary

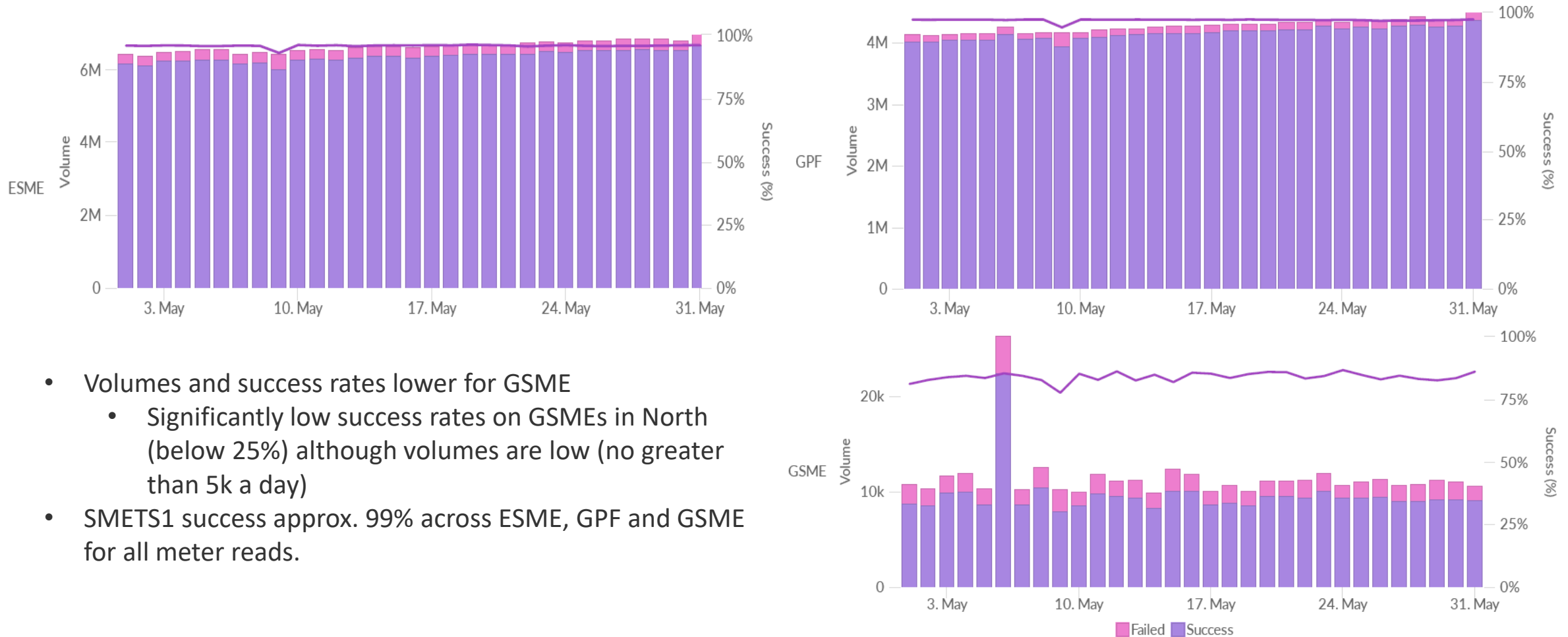
| | CSP North | CSP Central | CSP South |
|--|-----------------|-----------------|-----------------|
| Average RTT | 7729 sec | 10400 sec | 10424 sec |
| Median RTT | 1933 sec | 5817 sec | 6155 sec |
| Range (Shortest) (Longest) | (1) (86303) sec | (1) (86139) sec | (1) (85995) sec |
| Percentage of SRs Delivered within TRT (%) | 100 | 100 | 100 |
| Volumes (attempts) | 809k | 1756k | 1382k |
| Service Requests that failed to be delivered | 12% | 13% | 13% |

Observations

- Average success in period across SEC parties was 87% (across all regions)
 - ESME success between 81-86% across SMETS2 regions
 - GPF success approx. 89-98% across SMETS2 regions
 - 1 SEC Party sending large volumes (over 2million) in period with approx. 84% average success



Meter Reads Combined (by Device)



- Volumes and success rates lower for GSME
 - Significantly low success rates on GSMEs in North (below 25%) although volumes are low (no greater than 5k a day)
- SMETS1 success approx. 99% across ESME, GPF and GSME for all meter reads.



Performance Indicator Reporting

Post I&C – Distribution Network Operators Activity

1. SRV6.15.1 – Update Network Operator Certificates
2. SRV6.5 – Update Device Configuration (Voltage)
3. SRV6.22 – Configure Alert Behaviour

Post I&C Activity – SRV6.15.1 Update Network Operator Certs

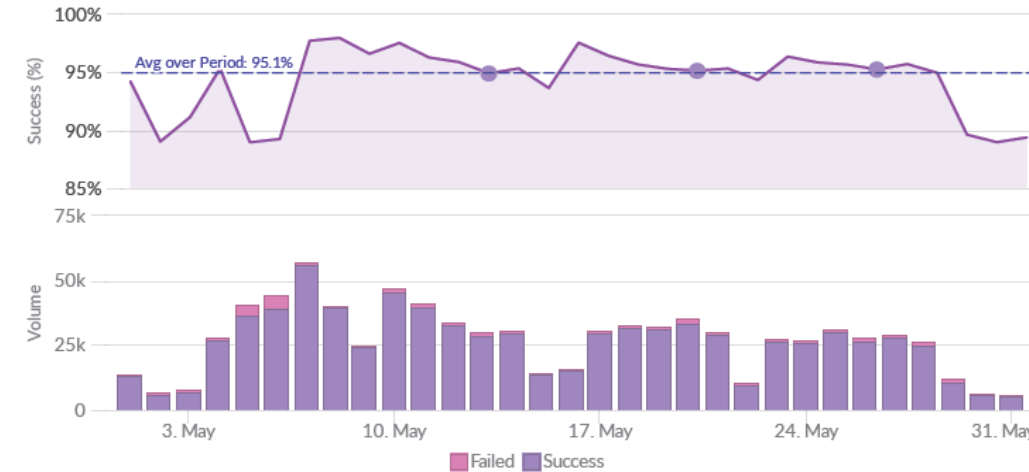
Summary

| | CSP North | CSP Central | CSP South | SMETS1 |
|--|-----------------|-----------------|-----------------|-----------------|
| Average RTT | 205 sec | 180 sec | 159 sec | 2 sec |
| Median RTT | 51 sec | 15 sec | 16 sec | 1 sec |
| Range (Shortest) (Longest) | (4) (14209) sec | (4) (19813) sec | (4) (20432) sec | (0) (10085) sec |
| Percentage of SRs Delivered within TRT (%) | 33 | 83 | 83 | 100 |
| Volumes (attempts) | 213k | 257k | 218k | 151k |
| Service Requests that failed to be delivered | 11% | 4% | 4% | 0% |

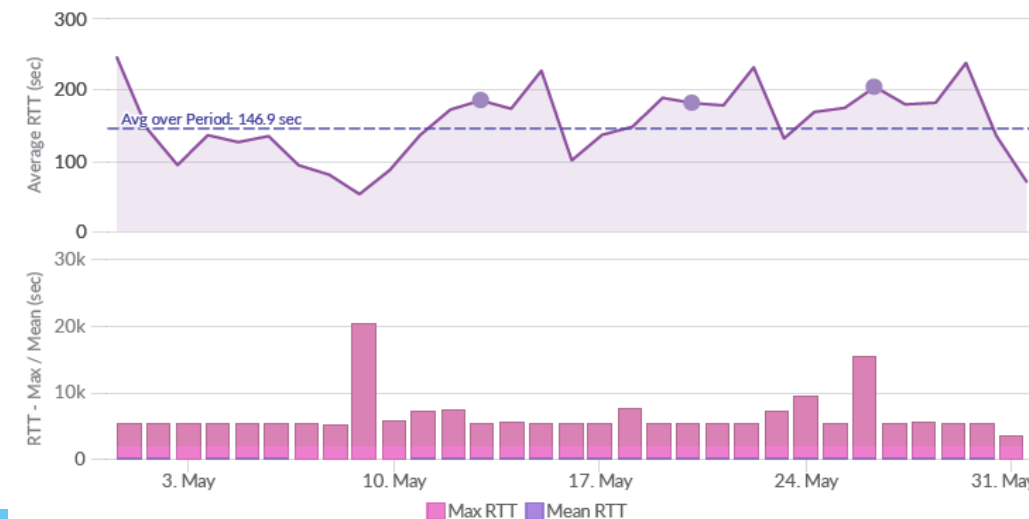
Observations

- Average success in period across SEC parties was 95.1% (across all regions)
 - CHF success between 81-97% across SMETS2 regions
 - 81% Success against CHFs in CSP North (compared to 97% on CHFs in CSPC&S)
 - ESME success between 96-97% across SMETS2 regions
 - GPF success approx. 99% across SMETS2 regions
 - GSME success approx. 87-93% across SMETS2 regions

Success Rate (Daily)



RTT (Daily)



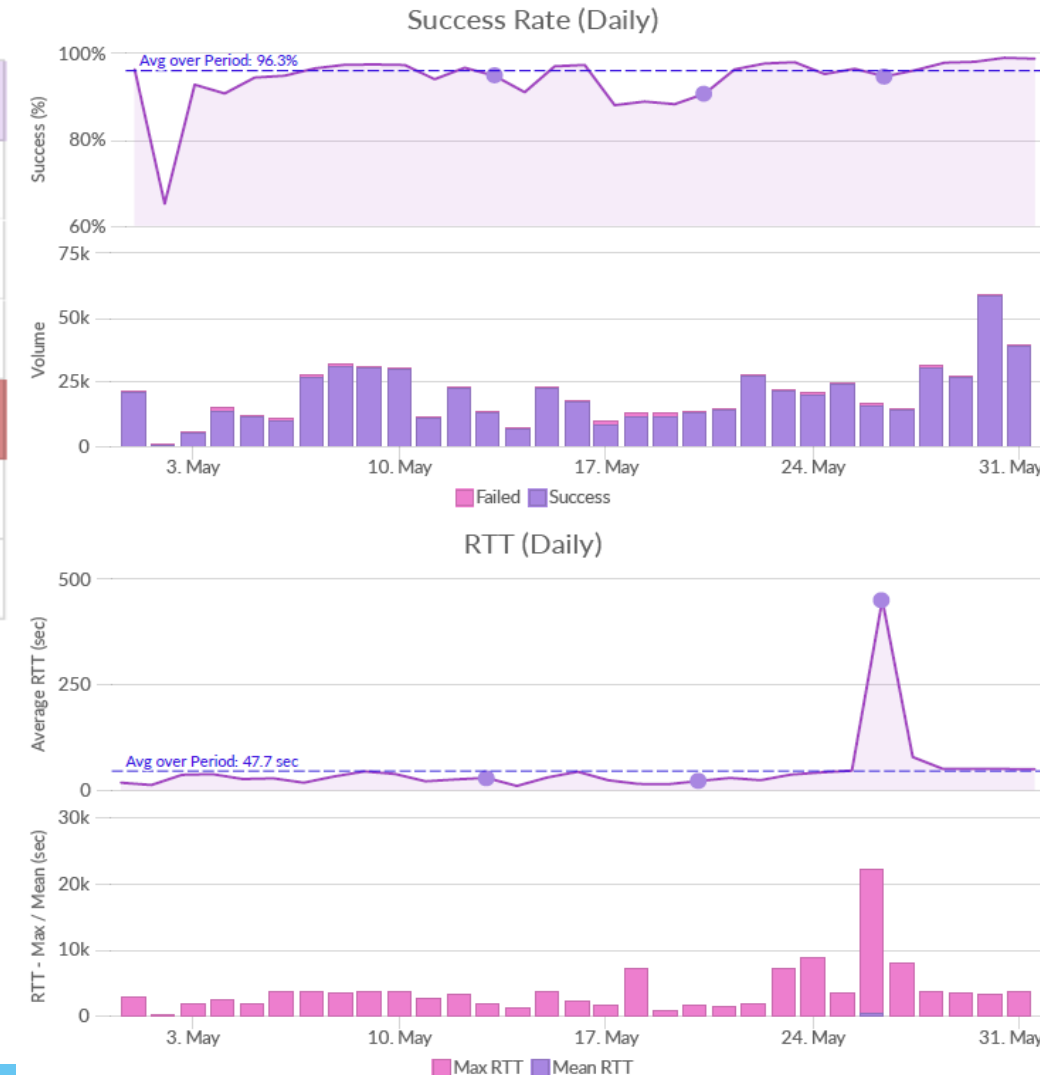
Post I&C Activity – SRV6.5 Update Device Configuration (Voltage)

Summary

| | CSP North | CSP Central | CSP South | SMETS1 |
|--|-----------------|-----------------|-----------------|-----------------|
| Average RTT | 67 sec | 9 sec | 8 sec | 64 sec |
| Median RTT | 16 sec | 5 sec | 6 sec | 41 sec |
| Range (Shortest) (Longest) | (2) (17655) sec | (2) (12833) sec | (2) (10968) sec | (4) (22281) sec |
| Percentage of SRs Delivered within TRT (%) | 80 | 99 | 98 | 0 |
| Volumes (attempts) | 43k | 99k | 105k | 387k |
| Service Requests that failed to be delivered | 3% | 10% | 9% | 1% |

Observations

- Average success in period across SEC parties was 96.3% (across all regions)
 - ESME success between 90-97% across SMETS2 regions. With SMETS1 on 99.4%
 - Lower success rates in CSP C&S although successful SRs are delivered within TRT
 - CSP North and SMETS1 higher success rates although average and median RTT longer than CSP C&S



Post I&C Activity – SRV6.22 Configure Alert Behaviour

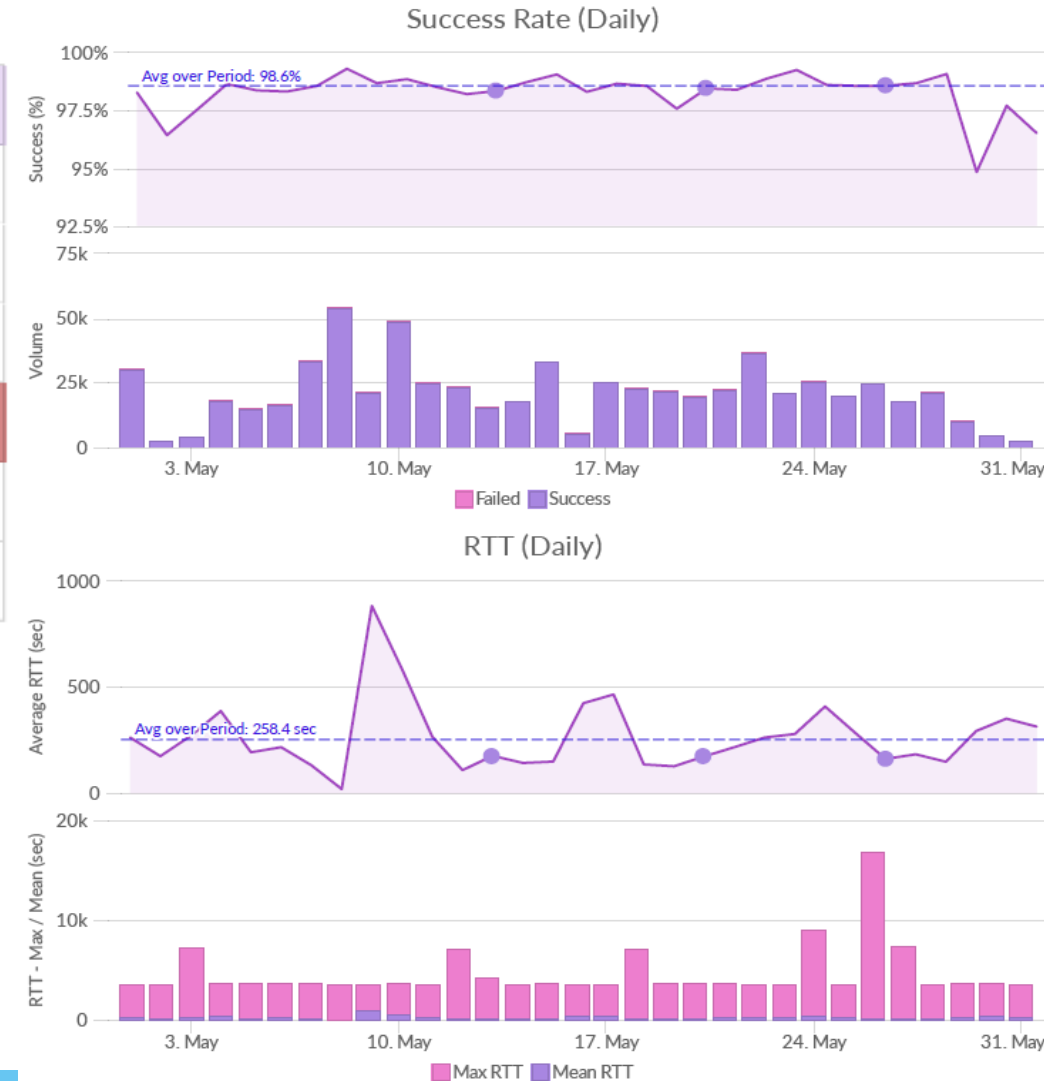


Summary

| | CSP North | CSP Central | CSP South |
|--|-----------------|-----------------|-----------------|
| Average RTT | 224 sec | 303 sec | 217 sec |
| Median RTT | 21 sec | 4 sec | 5 sec |
| Range (Shortest) (Longest) | (2) (14119) sec | (2) (16880) sec | (1) (16635) sec |
| Percentage of SRs Delivered within TRT (%) | 70 | 80 | 84 |
| Volumes (attempts) | 134k | 311k | 222k |
| Service Requests that failed to be delivered | 1% | 1% | 1% |

Observations

- Average success in period across SEC parties was 98.6% (across all regions)
- ESME success between 98-99% across SMETS2 regions
- GSME success between 97-98% across SMETS2 regions





Performance Indicator Reporting

Tariff Updates

1. SRV1.1.1 Update Import Tariff

Tariff Updates - SRV1.1.1 Update Import Tariff (Primary Element)

Summary

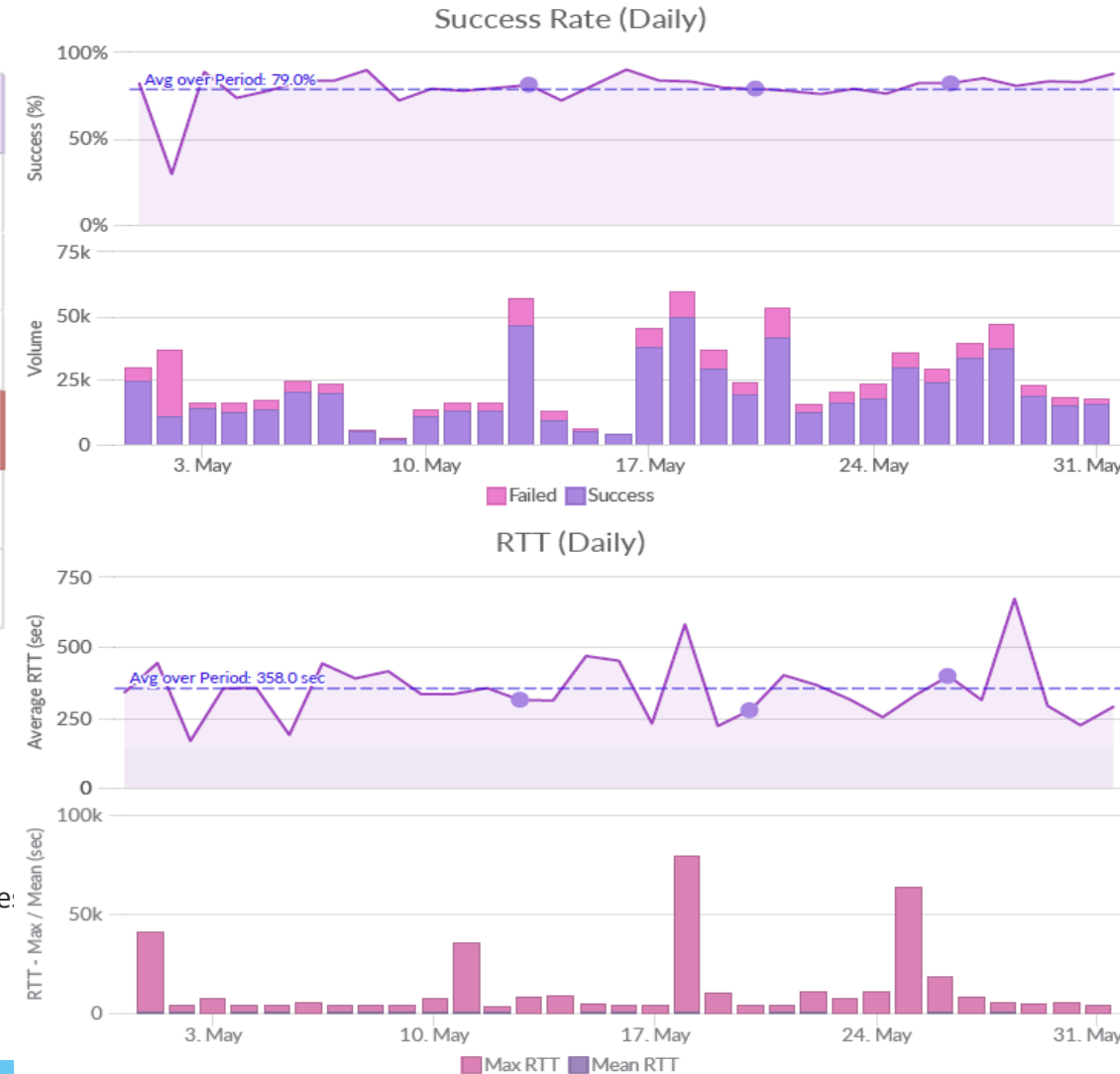
| | CSP North | CSP Central | CSP South | SMETS1 |
|--|------------------|-----------------|-----------------|-----------------|
| Average RTT | 584 sec | 540 sec | 541 sec | 184 sec |
| Median RTT | 59 sec | 17 sec | 17 sec | 57 sec |
| Range (Shortest) (Longest) | (10) (11517) sec | (6) (18886) sec | (6) (15385) sec | (0) (80144) sec |
| Percentage of SRs Delivered within TRT (%) | 4 | 51 | 51 | 7 |
| Volumes (attempts) | 89k | 203k | 162k | 337k |
| Service Requests that failed to be delivered | 35% | 34% | 34% | 3% |

Observations

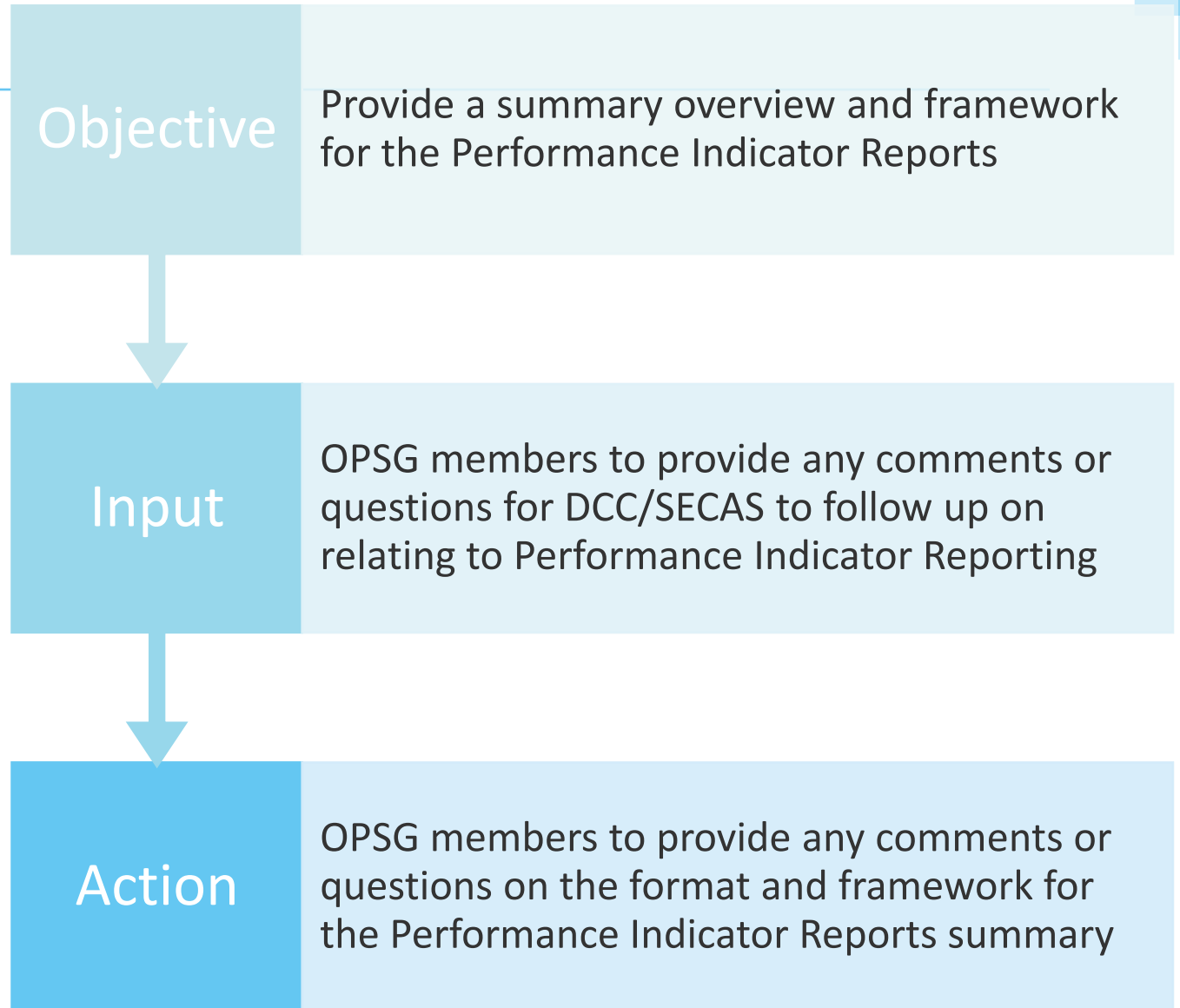
- Average success in period across SEC parties was 79% (across all regions), down from 90% in April 2021
- ESME success between 68-73% across SMETS2 regions. With SMETS1 on 96.4%
- GSME success between 58-63% across SMETS2 regions. With SMETS1 on 98.2%

Action

- Investigate significant drop in success rates and increase in RTTs across all SMETS2 regions. Volume: significantly higher than April Tariff Update attempts
- Explore the creation of an OPSG Issue/Risk related to the Success and scalability of Tariff Updates



Performance Indicator Reports – Recommendations



Appendix: Reports Index



1. Change of Supplier (Gain)
2. Change of Tenancy
3. DCC Alert
4. Device Alert
5. Distribution Networks Post I&C Activity
6. Install and Commission
7. Logistics CH Ordering and Returns
8. Meter Reads
9. Pre-Payment
10. Security and Key Management
11. Service Availability
12. Tariff Updates
13. Update Device Firmware Report