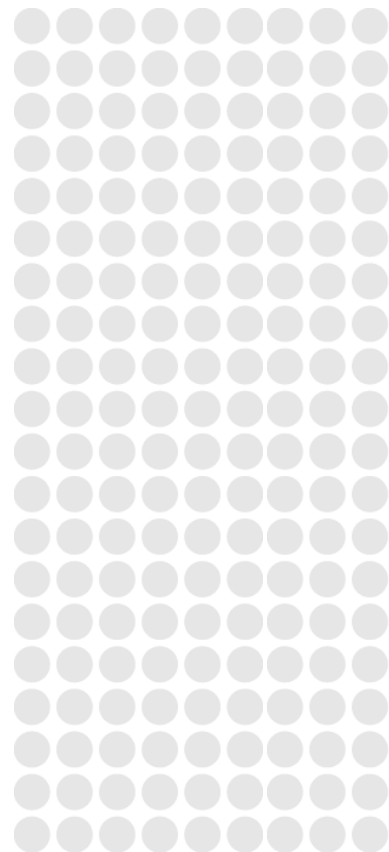




Gas Day Harmonisation

networks transition plan



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Definitions

Terms, abbreviations and acronyms	Meaning
BAU	Business as Usual
SYS	System Testing – The process of testing an application to verify that it meets specified requirements
SIT	System Integration Test
UAT	User Acceptance Test
UT	Unit Test
SDLC	Software Development Life Cycle
STLC	Software Testing Life Cycle
TSR	Test Summary Report - A report produced at the end of a testing cycle that provides information on actual testing compared to scheduled testing, and test results and defect metrics, as well as a recommendation based on testing results
TRR	Test Readiness Review
RMP	Retail Market Procedures

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1 Purpose

This document defines the approach APA Group will take to ensure the Networks business will be compliant with the National Gas Rules and Retail Market Procedures requirements to align all gas day start times within the East Coast Gas Markets to 6am AEST from 1 October 2019.

2 Key Personnel

The following APA personnel are nominated as key contacts for the Gas Day Harmonisation Transition.

Name	Role	Contact Details
Rick Abbott	Regulator and Commercial Contracts. AEMO GDH Market Readiness Co-Ordinator	P: 08 81139102 M : 0423 274 208 E : rick.abbott@apa.com.au
John Lenigas	Program Manager, Gas Day Harmonisation Project	P: 08 81139109 M : 0412 832 939 E : john.lenigas@apa.com.au

3 Overview

APA has initiated a program of work to ensure all Networks related assets and systems will be configured to operate to comply with the National Gas Rules and Retail Market Procedures Harmonised Gas Day requirements.

This program of work encompasses changes to the following systems:

- All affected gas meters
- Networks SCADA systems
- Networks Historian infrastructure
- National Interval Metering Data System (NIMDS)
- Customer Care and Billing (CC&B)
- Biztalk Data Transfer
- External party interfaces, such as shippers, third parties and AEMO.

It is APA's intent to have all assets and systems ready for operation on 1 October 2019. To achieve this some gas meter configuration upgrades will occur within the week prior to 1 October 2019. These assets and the approach to the upgrades is described below.



4 Approach

4.1 Field Devices.

The technical configuration of the existing field device falls into two categories:

4.1.1 *Remote Terminal Units (RTUs) requiring local reconfiguration.*

Local reconfiguration requires site attendance to reconfigure the device. These devices have been scheduled to be updated in the 1 week period 23 September 2019 to 30 September 2019. Once reconfigured, the data the devices will be providing will comply with the new gas day. ***In order to comply with reporting requirements for the current gas day, APA will initially report estimates for these meters from the point they are upgraded until gas day 30 September 2019, at which point data will be reconciled as part of the month end process.***

4.1.2 *RTUs remotely reconfigurable.*

Remote reconfiguration will allow the devices to support new, old and short gas days via updated of a local Gas Day Start Time set point in the device. These devices will be upgraded and tested from July 2019, with the new gas day start time to be loaded to all devices on 30 September 2019.

4.1.3 *Prioritisation of High Materiality Sites.*

High materiality sites have been identified and prioritised. Where appropriate dedicated teams of engineers will be deployed on the day to ensure the meter software upgrades are installed and tested. These team will remain available post go live in the event that site attendance is needed to address any issues.

4.2 Applications.

APA is undertaking the modification and reconfiguration of all internal applications affected by the Gas Day Harmonisation requirement.

4.2.1 *SCADA Systems*

SCADA Systems will be reconfigured to support remote up load of Gas Day Start Time set point to remote devices. This change will be complete by 16 July 19.

4.2.2 *Interval Metered Data Systems*

Interval Metered Data Systems will be reconfigured to support changes to Gas Day Start Time. These changes including end to end testing will be completed by 14 August 2019.

4.2.3 *External Parties*

APA is dependent upon a number of external parties for metering and other data. APA has engaged with all third parties to confirm readiness.



4.2.4 System Performance

Due to the alignment of GDST, simultaneous presentation of field data to APA's internal systems will occur. APA will undertake stress testing of all systems to validate operation by 14 August 2019.



5 Meter Reconfigurations

As per schedule 5, part 6, rule 4 of the National Gas Rules, the following meter reconfiguration scenarios are addressed.

5.1 Interval meters or physical gate points that have not been reconfigured to measure and record for a standard gas day.

None anticipated.

5.2 Interval meters or physical gate points that have been reconfigured to measure and record for a standard gas day.

APA has a range of assets across three Network Jurisdictions. The following details how Meter Readings, Estimated Meter Readings, Hourly Metering Data and Reporting will be managed prior to 30 September 2019 and on 30 September 2019.

From 1 October 2019 APA will comply with all requirements of the Harmonised Gas Day market.



5.2.1 Queensland - AEGIS RTUs - Local Reconfiguration, site visit required.

Area Meter Data for Brisbane North, Brisbane South, Gold Coast, Ipswich, Darling Downs, Wide Bay and Central Qld.

Meter Type	Meter Data (prior 30/9)	Estimation Strategy (prior 30/9)	Hourly Data (short day 30/9)
Interval Meters (91)	Estimate will be produced up to and including gas day 29/9 Data will be reconciled as part of the month end process.	Estimation rules as defined in the RMP.	The systems will produce 22hrs of actual data and collate this to reflect the gas day for reporting to AEMO and the market.

5.2.2 Queensland – Kingfisher RTUs - Local Reconfiguration, site visit required.

Area Meter Data for Brisbane North, Brisbane South, Gold Coast, Ipswich, Darling Downs, Wide Bay and Central Qld.

Meter Type	Meter Data (prior 30/9)	Estimation Strategy (prior 30/9)	Hourly Data (short day 30/9)
Gate Stations (16)	Actual data up until 30/9 Meters to be reconfigured on 30/9 Daily data will appear as actual	Estimation rules as defined in the RMP.	The systems will produce 22hrs of actual data and collate this to reflect the gas day for reporting to AEMO and the market.

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5.2.3 Queensland – Kingfisher RTUs – Remote Reconfiguration, no site visit required.



Area Meter Data for Brisbane North, Brisbane South, Gold Coast, Ipswich, Darling Downs, Wide Bay and Central Qld.

Meter Type	Meter Readings (prior 30/9)	Estimation Strategy (prior 30/9)	Hourly Data (short day 30/9)
Interval Meters(121)	No impact as system changes will only be effective in SCADA from 1/10	Estimation rules as defined in the RMP.	The systems will produce 22hrs of actual data and collate this to reflect the gas day for reporting to AEMO and the market.



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5.2.4 NSW – Mercury RTUs – Local Reconfiguration, site visit required.

Area Meter Data for Wagga, Cooma, Tamworth, Bombala, Tumut Valley, Bomen, Temora.

Meter Type	Meter Readings (prior 30/9)	Estimation Strategy (prior 30/9)	Hourly Data (short day 30/9)
Interval Meters (18)	No impact as system changes will only be effective in SCADA from 1/10	Estimation rules as defined in the RMP.	Systems will produce 24hrs of actual hourly data Last hour will only contain 30min of consumption Daily data will be reported as Actual to AEMO
Gate Stations (10)	No impact as system changes will only be effective in SCADA from 1/10	Estimation rules as defined in the RMP.	Systems will produce 24hrs of actual hourly data Last hour will only contain 30min of consumption Daily data will be reported as Actual to AEMO



5.2.5 NSW – Kingfisher RTUs – Local Reconfiguration, site visit required.

Area Meter Data for Wagga, Cooma, Bombala, Wallendbeen, Gundagai, Tumut Valley, Tamworth, Bomen, Uranquinty, Henty, Culcairn, Temora and Ilabo.

Meter Type	Meter Readings (prior 30/9)	Estimation Strategy (prior 30/9)	Hourly Data (short day 30/9)
Gate Stations (12)	<p>Estimate will be produced up to and including gas day 29/9</p> <p>Data will be reconciled as part of the month end process.</p>	<p>Estimation rules as defined in the RMP.</p> <p>Estimations will not be able to determine same time last week as no data will be available on the ½ hour times therefore estimates will use default values.</p> <p>Data will be reconciled as part of the month end process.</p>	<p>Systems will produce 24hrs of estimates hourly data.</p> <p>Data will be reconciled as part of the month end process.</p>



5.2.6 South Australia – Kingfisher RTUs – Remote Reconfiguration, no visit required.

Area Meter Data for South Australia.

Meter Type	Meter Readings (prior 30/9)	Estimation Strategy (prior 30/9)	Hourly Data (short day 30/9)
Interval Meters (180)	No impact as system changes will only be effective in SCADA from 1/10	Estimation rules as defined in the RMP.	Systems will produce 24hrs of actual hourly data Last hour will only contain 30min of consumption Daily data will be reported as Actual to AEMO
Gate Stations (3)	No impact as system changes will only be effective in SCADA from 1/10	Estimation rules as defined in the RMP.	Systems will produce 24hrs of actual hourly data Last hour will only contain 30min of consumption Daily data will be reported as Actual to AEMO

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5.2.7 Northern Territory / Alice Springs – Remote Reconfiguration, no visit required.



Area Meter Data for Alice Springs.

Meter Type	Meter Readings (prior 30/9)	Estimation Strategy (prior 30/9)	Hourly Data (short day 30/9)
Palm Valley(8)	No impact as system changes will only be effective in SCADA from 1/10	As per usual estimation rules for daily data.	The systems will produce 22hrs of actual data and collate this to reflect the gas day for reporting to the market.



Scenario	Likelihood (Low, Med, Hi)	Impact	Pre Go-Live Mitigation	Post Go-Live Contingency Actions
Resource Shortage during site deployments. Sickness or unplanned absence.	Med	Some sites will not be upgraded to new GDST leading to estimates being presented post 1 October 2019.	Resource planning to accommodate resource unavailability. Vendor engagement to support internal resources.	Reliance on standard estimation strategies until upgrades are complete. Continue resource engagement to complete remaining work.
Device or comms failure	Low	Site will not report data.	Device testing and validation.	Reliance on standard estimation strategies until device repaired or communications restored.
Force majeure during migration work	Low	Site upgrades will be delayed.	Daily monitoring of weather conditions and reforecasting deployment work to minimise impact. Medium term analysis of weather forecast and resource planning to accommodate expected adverse conditions. Secure Vendor resourcing to support additional effort if needed. BCP planning to be reviewed and prepared.	Reliance on standard estimation strategies until upgrades are complete. Lift resource allocation to accelerate remaining work. BCP to be enacted if required.
Uncontrolled or unplanned work.	Low	Resourcing impacts. System outages.	Ensure planning accommodates go-live blackout for all other work.	Prioritise effort to address issue as soon as possible.



			Heightened vendor and IT support during cutover period.	
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5.4 Reporting

APA will complete AEMO monthly readiness assessments as required.

Additionally, APA will issue to AEMO:

- Weekly reports commencing 2 September 2019 detailing progress on preparation for Gas Day Harmonisation.
- Daily reports commencing 23 September 2019 detailing progress of site completions and any reforecasting of effort or change in approach.
- A report at 10am on 30 September 2019 indicating readiness of short gas day processing and data validation to be executed on 1 October 2019.
- A report at 10am on 1 October 2019 indicating outcomes of short gas day processing and data validation for 30 September 2019.
- A report at 10am on 2 October 2019 indicating outcomes of first aligned gas day processing (1 October 2019) and data validation status.

6 AEMO Market Trial

APA has raised if there is a need for an end to end market trial. AEMO has indicated that there is not a requirement for a co-ordinated market trial.

7 Site and MIRN List

Download the [Site and MIRN List](#).



8 Schedule

