



Electricity Authority

Service Report and User Guide
August 2023

Prepared by Jade Operations

jade

| business solutions

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OPERATIONAL ITEMS

Performance Standards

Measurement	Requirement	Actual	Met	Ref
Number and detail of service Provider Code or agreement breaches and details	Report delivered to Authority detailing breaches		Yes	Schedule 2 Non-functional requirements 5.2 table 1
Disaster recovery and backup obligations			Yes	Schedule 2 Non-functional requirements Section 7 (7.1 and 7.4)
Number and details of participant rule breaches	Report on 1 st business day delivered to Authority SFTP directory	01 September 2023 at 03:23	Yes	
Maximum number of concurrent users for month		2033	Yes	Schedule 2 Non-functional requirements 2.7
During regular service hours (0730 hours to 1930 hours each day), the provider must ensure that the system is available to participants for no less than 99.9 per cent of the time in any one month. This statistic considers that planned, pre-approved, non-urgent maintenance outages are not included in the calculation of availability		100%	Yes	Schedule 2 Non-functional requirements 5.2 table 1
Outside regular service hours (between 1930 hours and 0730 hours) the provider must ensure that the system is available to participants for no less than 98.0 per cent of the time in any month. This statistic considers that planned outages will not count against availability level targets.		100%	Yes	Schedule 2 Non-functional requirements 5.2 table 1
The Registry must use its best endeavours to provide a service availability of 99.8 per cent or better, with nil or minimal outages.		100%	Yes	

<p>Unless otherwise approved in writing in advance by the Authority (such timely approval not to be unreasonably withheld) there must be no more than two planned outages per month, one of which is reserved for the monthly production release of software. Each planned outage must be at a time to be agreed by the parties and be no more than 2 hours in duration. Any planned outage of more than 2 hours duration must have the prior approval of the Authority, such timely approval not to be unreasonably withheld.</p> <p>Approved, pre-planned outages do not count against service level targets.</p>		1) Release of Application Deploy 23.05_02 to marPreg on 20 of August at 03:00.	Yes	Schedule 2 Non-functional requirements 5.3
Service response time of transactions sampled at regular intervals (every 1–5) minutes as agreed between the Authority and the Provider) during regular service hours for the system at the delineation point of the system to external communications providers			Yes	Schedule 2 Non-functional requirements 5.2 table 1
<p>96% of all sampled transactions will have a response time of less than 2 seconds for all the components managed by the system at the delineation point of the Registry network.</p> <p>Longest time period in seconds</p> <p>Percentage of transactions exceeding 2 seconds</p>		<p><2 =99.70%</p> <p>96.55</p> <p>0.30%</p>	Yes	Schedule 2 Non-functional requirements 5.2 table 1
<p>90% will have a response time of less than 1 second for all the components managed by the system at the delineation point of the Registry network</p> <p>Percentage of transactions exceeding 1 second</p>		<p><1 =99.42</p> <p>0.58%</p>	Yes	Schedule 2 Non-functional requirements 5.2 table 1
<p>Number of password lockout alerts.</p> <p>Investigation of all repeated lockout alerts required.</p>		0		Schedule 2 Non-functional requirements 25.1 (n)
Help desk available	7:30 to 19:30 hours each business day	100%	Yes	Clause 11.20
Registry reports to participants day 1 09:00	09:00 hours on the first business day of the month	31August23 21:10	Yes	Clause 11 of Schedule 11.1
Issuing of confirmation notices within 4 hours of receipt of information provided			Yes	Clause 11.21
Number of ICP's changing traders	16:00 on the 6 th business day of the month		Yes	Clause 11.23

Such other information as may be agreed from time to time between the Registry and the Board	16:00 on the 6 th business day of the month		Yes	Clause 11.23
Reports to the clearing manager and systems manager by 16:00 on first business day of the month	16:00 on first business day	01 September 2023 00:27	Yes	Clause 11.24
By 16:00 on 4 th business day deliver to the reconciliation manager the ICP days report	16:00 on 4 th business day	06 September 2023 01:33	Yes	Clause 11.26
By 16:00 on 4 th business day deliver to the reconciliation manager the loss factors report	16:00 on 4 th business day	04 September 2023 00:00	Yes	Clause 11.26
By 16:00 on 4 th business day deliver to the reconciliation manager the balancing area report	16:00 on 4 th business day	04 September 2023 00:00	Yes	Clause 11.26
By 16:00 on 4 th business day deliver to the reconciliation manager the half hour identifiers report	16:00 on 4 th business day	06 September 2023 05:48	Yes	Clause 11.26
By 16:00 on 1 st business day deliver to the market administrator (Authority) a report summarising events that have not been notified to the Registry with specified time frames	16:00 on 1 st business day	01 September 2023 00:01	Yes	Clause 11.27
Notifications or change within the Registry to participants affected	Same day		Yes	Clause 11.29
Registry to publish Schedule of loss category code and loss factors	Within one day of notification of change		Yes	Clause 22 of Schedule 11.1
Registry to publish Schedule of mapping between NSP's and balancing areas	Within one business day of notification of change		Yes	Clause 24 of Schedule 11.1
Registry to publish Schedule of all NSP identifiers and supporting information	Within one business day of notification of change		Yes	Clause 30 of Schedule 11.1

Adhoc Reporting Statistics

Report	Run	Complete	Average time (seconds)
Distributor Maintenance	2828	2828	4.2
Metering Maintenance	1319	1319	7.2
NSP Mapping Maintenance	32	32	7.0
Report - Audit Compliance	171	171	1037.9
Report - Breach Current	332	332	1.5
Report - Current Details	116	116	631.9
Report - Event Detail	32718	32718	90.3
Report - File Audits	1	1	0.2
Report - ICP List	5680	5680	231.9
Report - Loss Factor Codes	76	76	6.3
Report - Maintenance Breach	186	186	0.2
Report - Metering Installation Information	533	533	1424.9
Report - NSP Mappings	106	106	4.2
Report - Switch Breach History	87	87	25.2
Request - Notify Resend	31	31	0.7
Request - Switch Resend	8	8	1.4
Switch AC	567	567	0.3
Switch AN	16678	16678	0.2
Switch AW	2721	2721	0.6
Switch CS	14345	14345	1.3
Switch MN	344	344	2.5
Switch NT	20340	20340	0.3
Switch NW	2899	2899	0.2
Switch RR	1024	1024	0.2

Trader Maintenance	2917	2917	3.7
Totals	106059	106059	50.4
Number of Reports successfully Re-Processed	18		

Batch File Statistics

Total	Complete	Completed by 07:30	Not completed by 07:30
104440	104440	104440	0

Details of Batch File Reports not completed by 07:30 Report	

Provider Code or agreement breach

Date	Number and detail of Provider Code or agreement breaches and details (ref Schedule 2 Non-functional requirements 5.2 table 1)

Other Information

The following reports/files are supplied to the Authority by the 6th business day of each month (unless otherwise specified) to the SFTP server:

- ICP's electrically connected, electrically disconnected, decommissioned and switched by Retailer and NSP
- ICP's electrically connected, electrically disconnected, decommissioned and switched by Retailer
- ICP's electrically connected, electrically disconnected, decommissioned and switched by Distributor
- Report PR-130 as defined in functional specification
- Details of participant rule breaches (supplied on first business day)
- Details of participant switch breaches (supplied on first business day)

Business Continuity Plan Test

The following annual tests were completed in April 2023 (Jade Tracker #1047365 refers);

1. Placing 2 test calls to the people below advising them that this is a test call to confirm contactability in a Business Continuity event

a) Peter Taylor - Commercial Manager - 04 460 8866 or 027 281 7672 (Alternative Will Goldsmith)

b) Jade BCM Manager.

2. Have a Jade Developer log in from home to confirm connectivity.

Summary of Incidents

There were no incidents.

Software Related Fixes and Enhancements

ID	Description	Response
PAR69585 (ER-1315)	<p>Recommended hot patch from Jade Platform support:</p> <ul style="list-style-type: none"> <i>We have uncovered a problem with arrays when using the atPut method to extend the size of the array, where entries are being set to null</i> <p>There does not appear to be any implications for the Registry, nonetheless the patch will be applied to prevent any issues moving forward</p> <p>(Jade platform minor version upgrade required to apply recommended hot patch)</p>	Release 23_05_02

Data Fixes

Number and details of incidents requiring data fixes.

ID	Description	Severity	Response
-	-	-	-

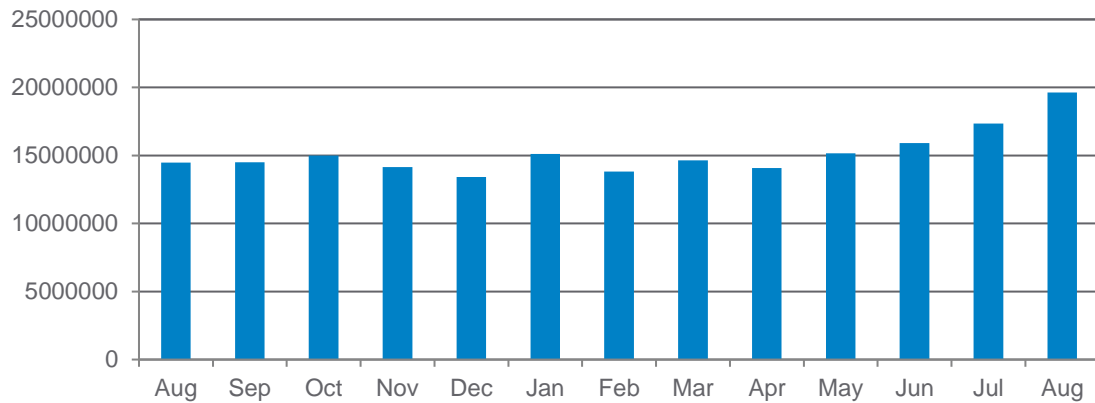
Schedule of Issues Raised

A summary of issues raised during the month.

ID	Description	Severity	Response
	<p>The nt switch event ntProfiles is a reference and not an attribute, that means when unit testing tears down the data any string arrays in ntswitch::ntProfiles are not deleted.</p> <p>Add a delete method on this class. this will not affect production as these events are not deleted, however it will stop buildup of leaked persistent string arrays in development.</p>		
ER-1316	Investigate source of persistent string array instances.	Medium (Priority C)	Verification Passed
ER-1315	Jade plant recommendation for release of hot patch Par69585	Medium (Priority C)	Closed
ER-1314	In the browser validate gpsNorthing an exception was raised when the string contained a value of -384106374 (decimal value conversion)	Medium (Priority C)	Closed

	<p>CR-1267 As per solution proposal, when a participant registers to use SSO and the Registry Administrator is asked to update their external identifier and option should be provided to automatically create security groups.</p> <p>there are a few ways of looking at this, ultimately we should make it as pain free as possible.</p> <p>For example:</p> <p>Genesis register to user SSO and request automatic group generation:</p> <ul style="list-style-type: none"> * a group is created called GENE_Inquiry with no resources assigned * A group is created called GENE_TraderSwitching with NT, AN, CS, RR, NW, AW assigned * ... and so forth <p>that might be a little inflexible, and not for everyone (MEPs and distributors obviously for not need a trader switching group)</p> <p>...or we can provide instructions in the SSO guide detailing how participants can setup a group and resources, then provide the combination as an input file we load...</p>	Medium (Priority C)	Submitted
ER-1313	CR-1267 As per solution proposal.		
ER-1312	A user may elect to sign on using SSO, a link on the login page must place the user into the SSO authentication flow and ultimately return them to the Registry as authenticated users	Medium (Priority C)	In progress
ER-1311	CR-1267 As per solution proposal - a supervisor must be able to create and maintain security groups in the browser	Medium (Priority C)	Submitted
ER-1310	CR-1267 REST API's as per solution proposal for maintaining SSO users and groups	Medium (Priority C)	Verification Pending
ER-1309	As per pages 1 and 2 of SCIM design document - create the groups security and user classes for SSO	Medium (Priority C)	Verification Pending

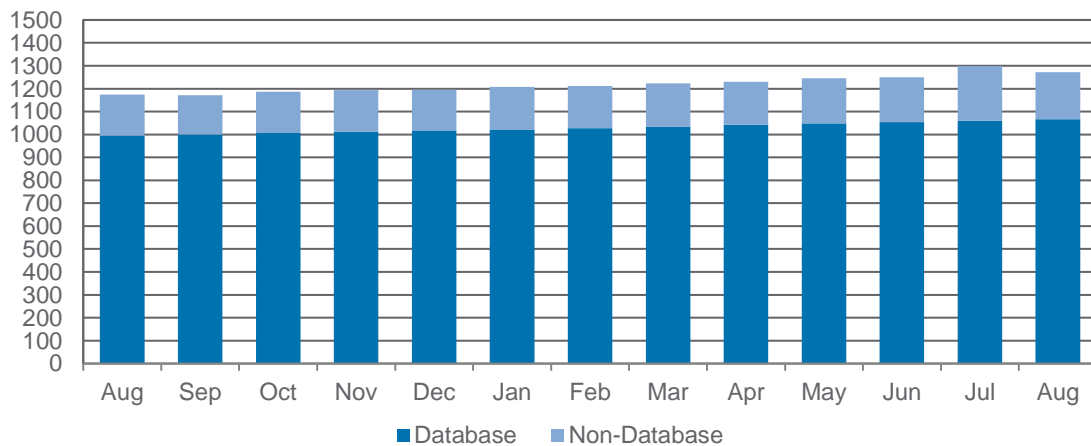
Database Transactions Production



Transaction Volumes

Transaction name	This Month	Last Month	Percentage Change
All Transactions	19,634,117	17,344,739	13%

Database Size Production (GB)



Database Growth

Class	This Month MB	Last Month MB	Change MB
Database	1,091,754	1,085,221	6,533
Non-database	210,077	244,115	-34,038
Total	1,301,831	1,329,336	-27,505

Service Disruptions (Production)

Scheduled outages are excluded from the calculation of the Availability Percentage.

Performance Measure	
Availability	100%
Number of Scheduled Outages	1
Number of Unscheduled Outages	0
Last Unscheduled Outage	May2021

Application Release Activities

Day	Detail	Authoriser
20Aug23 03:00 – 03:24	Deploy of Release 23.05_02 to marPreg	Greg Matthews

Other Activities

Day	Detail	Duration hh/mm	Authoriser

Backup Performance Production

The backup requirements were met this month.

Backup Type	Run days	Run Time	Expected Duration hh/mm
Disk	ALL	19:00	01:00
Tape	ALL	01:00	05:00

Electricity Authority Contact Information

Contact for day-to-day procedures or any unexpected events.

Contact Name / Role	Contact Details
Commercial Manager	Peter Taylor P: 04 460 8866 M: 027 281 7672 E: Peter.Taylor@ea.govt.nz

Automated Fault Escalation Profiles – Priority A Incidents

In the event of a “priority A incident” where the hardware or the application has an unscheduled outage the Electricity Authority has advised that escalation via email or text is not required.

However, if there is an unusually long outage impacting participants, Peter Taylor requires to be contacted.

Status of Functional Specification

(i.e., a report on the status of the functional specification);
Version 22.38 released to UAT and Prod 02 February 2023

Status of CR's and SDA's

(i.e., a summary report of the status of all CRs and SDAs);

CR Identifier	Description	Status
CR-1196	Switch Breach Inquiry screen	On hold. Low priority.
CR-1197	EIEP hub access for non-participants	On hold. Authority: pending consultation with interested parties. Aligned with CR-1251
CR-1208	Integrate EIEP 5A into the Registry	UAT complete. Release to production to be confirmed by the Authority.
CR-1222	Inquiry only restful web services	Approved. Development underway.
CR-1251	EIEP Transfer Hub – White Paper	Approved. Development underway.
CR-1256	Trader Default Technical and User documentation	In CR development, not signed off yet. With Authority for review.
CR-1257	Trader Default software changes	In CR development, not signed off yet. With Authority for review.
CR-1260	Remove Automated Logon	Released to the dedicated secure test system (marSreg) 01/10/2021 Release pending to UAT and Production
CR-1262	(Config) Disable iframes Response Headers	Released to the dedicated secure test system (marSreg) 01/10/2021. Release pending to UAT and Production
CR-1267	Single Sign-on (SSO)	Approved. Development underway.
CR-1269	Outage Communications	Documents with the Authority.

Design Consultation

This is outside the normal CRs and pertains more to design work required by market design.

Design consultation chargeable hours

Resource	Hours this month	Hours to date – since 01 May 2017
ACCES (MD-1212) – Project Management/Architect/Consultant/Designer	0.0	90.50
Prohibit Saves and Winbacks (MD-1233) – Project Management/Architect/Consultant/Designer	0.0	26.25
Total	0.0	116.75

Provider initiated Audits

(i.e., essentially the annual audits. Also, any other audit (relevant to the registry) Jade has initiated. Does not include CRs).

- An audit was carried out by Grant Thornton New Zealand Ltd in March 2023.

Breaches

There were no breaches reported this month.

Code Changes to be considered

(i.e., events that may highlight an area where a change to the Code may need to be considered);

User Group Meetings

(i.e., a summary of any user group meetings held and the items discussed);

The most recent user group meeting was on 20 December 2022.

AGREED PROCEDURES

Change Control

All significant changes will be notified to the Electricity Authority, and a Tracker work request will be created to record authorisation, schedule, and implementation detail.

Change requests must be approved within 1 month of the request being submitted.

In exceptional circumstances, for example where Jade Care consider server integrity to be under significant and immediate threat, changes may be applied with little or no notice.

Application Release Authorisation

Releases are automated through the Jade Care toolset. Submission and authorisation are separate functions, and the authorisation facility may be extended to the Electricity Authority or may be applied by the Client Service Manager where the Electricity Authority chooses not to use this facility.

Application Restarts

Requests for restart of applications or servers must be made in writing. In exceptional circumstances, and where the requestor is known to Jade Care staff, a verbal request may be sufficient, provided it is confirmed in writing shortly after the request is made.

Hardware Fault Reporting

SNMP traps will be enabled for all servers. Traps will result in alerts being raised at Jade Care and Tracker incident records being created. Automated escalation can be applied to these calls to alert the Electricity Authority and third parties to the event.

Arrangements may be put in place to allow Jade Care to contact hardware service organisations directly in the event of hardware issues. Contact and call identification details will be required as a prerequisite to implementation.

Anti-Virus Product

Anti-virus product is installed on all managed servers. Engine and pattern updates are applied on receipt, and full scans are run weekly.

Recovery Procedures

Application Recovery

The environments are set up to perform automatic application recovery in the event of a server undergoing a non-scheduled restart.

If there is a physical failure on the hardware where the VM is hosted on, the VM will be moved to a different physical VMware host. In the event of a catastrophic site failure, an SDS takeover will occur to the DR site upon approval by the Electricity Authority.

Server Recovery

Server recovery should never take place unless agreed by the Electricity Authority, Jade Care and hardware service representatives.

If a server operating system needs to be rebuilt, Central Systems will assist the onsite technician in rebuilding the server configuration and operating system to a state where Jade Care access is restored. Recovery of the full configuration, the applications and other third party software will be undertaken by Jade Care.

Server Integrity

The Electricity Authority servers are configured and maintained to Jade Care standards. This configuration is critical to the operation of the process automation and monitoring software.

It is essential that all changes to the server or application software is either performed by, or with the fore-knowledge and agreement, of Jade Care.

Reporting

Systems Management Report

This systems management report is to be provided by email to customer staff as advised. The target date for delivery is the 10th business day of the month following the calendar month to which the report relates.

Incident Reports

An incident report will be prepared for each unscheduled outage and will be emailed to customer staff as advised from time to time within 3 working days of any outage. These reports relate only to those items managed by Jade Care; e.g. network issues and hardware failures will not be subject to a report.

Jade Care Recommendations

Where Jade Care has recommendations for changes to hardware or the operating environment, these recommendations will be submitted to the Electricity Authority management. Implementation of such recommendations will be formalised through the change control process and documented through the systems management report in summary form.

Software Licences and Media Storage

All software media and licences must be kept in secured storage in reasonable proximity to the servers.

Personnel and Contact Details

The Electricity Authority must advise Jade Care of changes in personnel and contacts details where individuals are named as direct contacts. Fault escalations are pre-defined and automated to individual email addresses and SMS capable devices. Leave coverage and personnel changes must be advised for these functions to be effective.