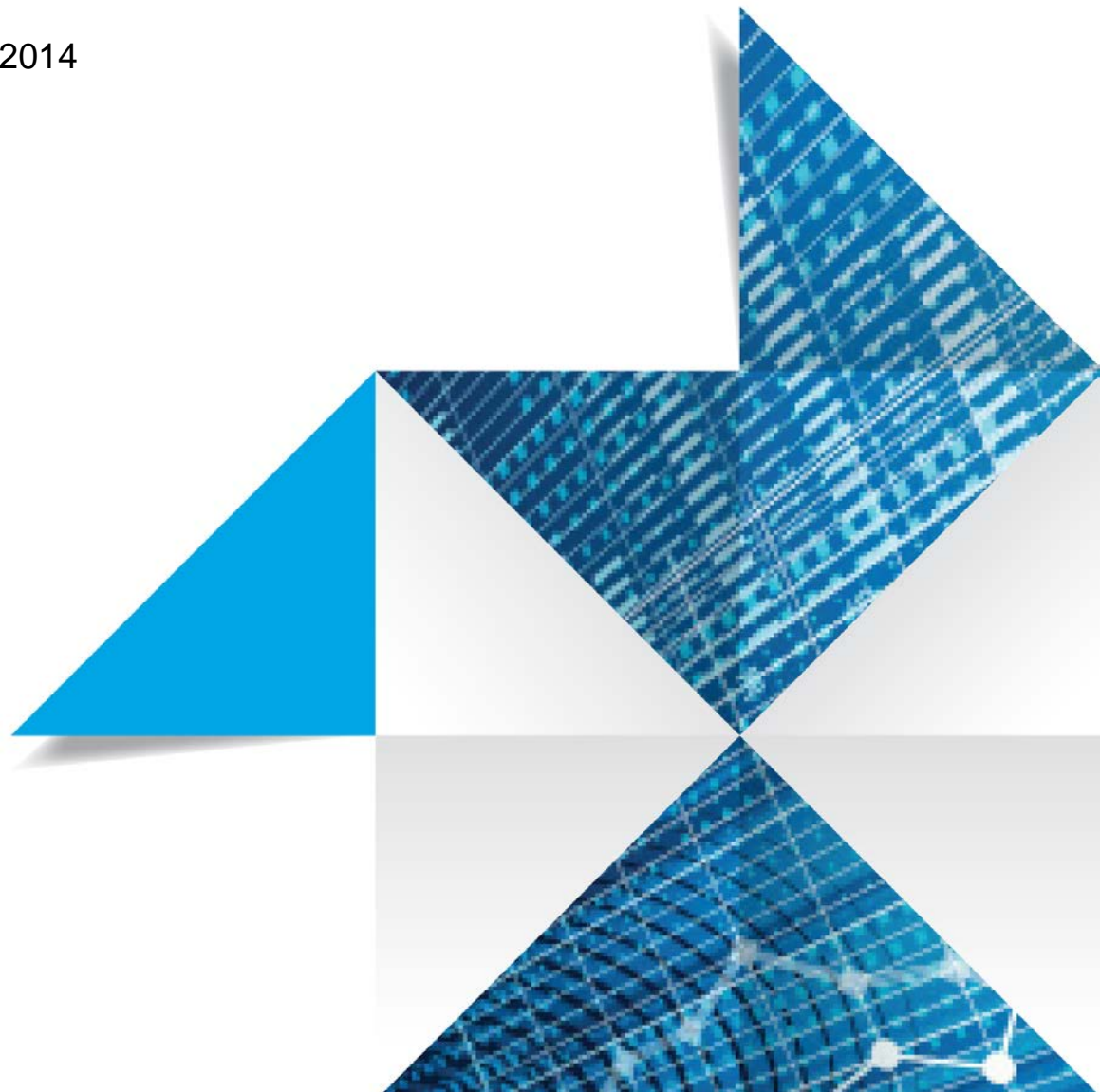




WITS: Gate Closure Timing Change

High Level Estimate

Friday, 16 May 2014



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Introduction

This document outlines at a high level the work required in WITS to support a change from a two hour to one hour gateway closure, and an estimate of the effort to carry out the work.

This information is provided for the purpose of planning only. If the EA wishes to progress with the work, further analysis will be required and a more complete estimate will be provided.

Requirements

The Electricity Authority is carrying out a review of the 2-hour gate closure for bids, offers and reserve offers, with the view to possibly shortening it (to 1 hour or even to 30 minutes before the start of the relevant trading period). Part of the review will be an assessment of the costs and benefits of making such a change, and part of the costs will be the costs of changes to service provider systems and processes.

The initial CBA will be based on a rough order estimate of costs and benefits. Should this indicate it is worth continuing then a more accurate estimate will be required.



Analysis

Order Submission

Participant Interface

- Some wording changes on front end screens, including help pages
- Logic changes in order submission code (multiple packages affected) to handle new gateway rule

Estimated effort (development and unit testing): 10 days

System Operator Interface

No change.

Gateway Compliance Reporting

Participant Interface

- Logic changes in gateway compliance code (multiple packages affected) to handle new gateway rule

Estimated effort (development and unit testing): 5 days

Electricity Authority Interface

- Possible requirement to change the name of the daily wits-2hr-rr-yyyy-mm-dd.xml report and change xml references from twohr to a more appropriate naming scheme
- Associated changes to scripts for transferring report to EA

Estimated effort (development and unit testing): 1 day

System Testing

NZX System Testing

To include testing of the website, web services and output data.

Estimated effort: 3 days

Participant Testing

User acceptance testing with participants to provide assurance that their systems are capable of handling the changes.

Estimated Effort: 2 days



Estimated system change cost (excl G.S.T)

| Project role | Estimated effort (days) | Hourly rate | Estimated Cost |
|---------------------------|-------------------------|-------------|----------------|
| Project Manager | 2 | \$250 | \$4 000 |
| Senior System Developer | 16 | \$201 | \$25 728 |
| System Developer / Tester | 5 | \$185 | \$7 400 |
| Audit (external) | 2 | \$150 | \$2 400 |
| Cost estimate (inc Audit) | | | \$39 528 |

