

# LINE CHARGE VOLUME RECONCILIATION



## Acknowledgement

- A big thank you to Northpower for commissioning this work.
- And for subsequently releasing it for the purposes of this presentation.



### Introduction

- Comparison of the kWh components of the Retailer and Network supplied "non-half hourly metered ICP" (NHH) EIEP1 files and the Mass Market component of the Retailer volumes returned by the Reconciliation Manager for the financial year ending Mar2016.
- Aim was to detect any systematic variance between Retailer EIEP1 volumes and Market volumes to see if NPOW was missing out on any lines charges.

### **Exclusions**

- Fixed Charges NPOW derives these from the registry ownership.
- Tariffs NPOW assigns the Tariff it believes is appropriate based on its metering records.
- Unmetered Load NPOW applies a fixed charge to streetlight unmetered load, therefore excludes it from its KWh lines in the EIEP1.
- Large HHR load NPOW monitors this separately.

## Challenges

- Retailers submit some data as HHR to the market and NHH in the EIEP1.
  - Meant we could not just use the NHH return from RM.
- Some retailers not following the EIEP1 spec.
  - Meant files had to be adjusted to "standard" before they could be used.
  - This is an ongoing issue for NPOW.
- Sheer volume of files to be processed (EIEP1 files plus EIEP3 files)
  - JC databases rule!
  - A significant amount of time was spent just wrangling files to make sure all data was there exactly once.

### Procedure

- Import and Collate EIEP1 (Retailer and Network) and EIEP3 files.
- Import and Collate latest RM Files.
  - GR-050 (SUMMKWH).
  - GR-120 (UFESUMM).
- Reduce Market Volumes by Loss factors to bring them in line with "metered volumes".
  - UFE was reduced by the mass market loss factor
- Compare Volumes
  - EIEP1 Vs GR-050 (LA) GR-120 (LA) EIEP3.

## Adjustments

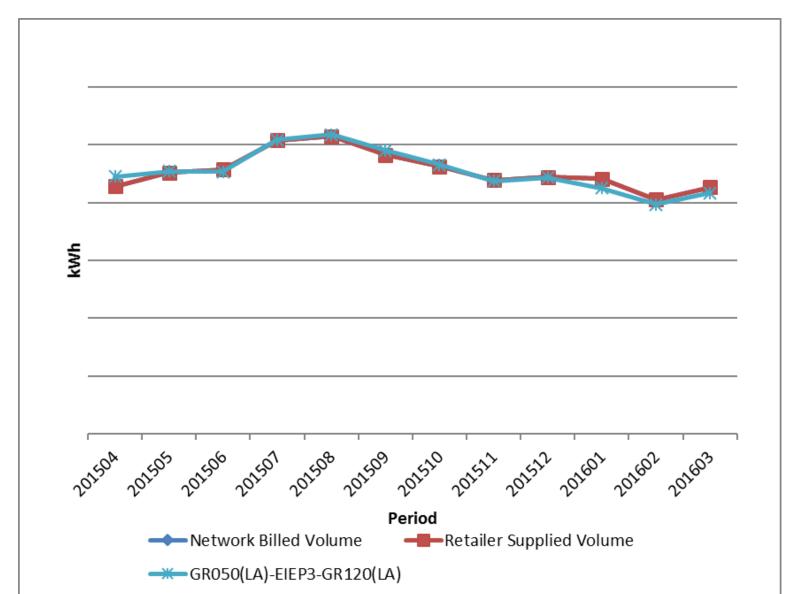
- There are a couple of retailers with a significant Unmetered component to their volume.
- Calculate UFE by month by Retailer.
  - Used JC reconciliation Dbase and the Registry Unm KWh/day field.
  - Summed by retailer and applied if necessary

## JC Re

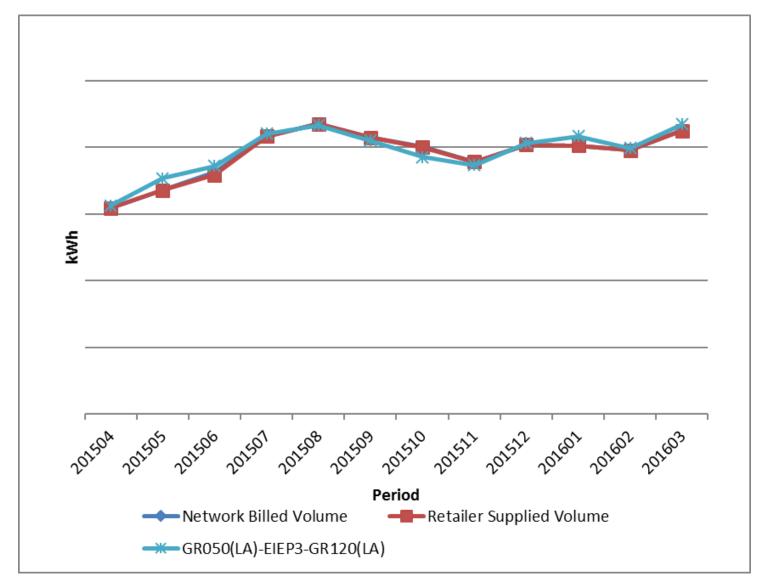
### Results

- Generally there was a good agreement (to within 0.5%).
- A few unexpected results.
- A small number of bad results

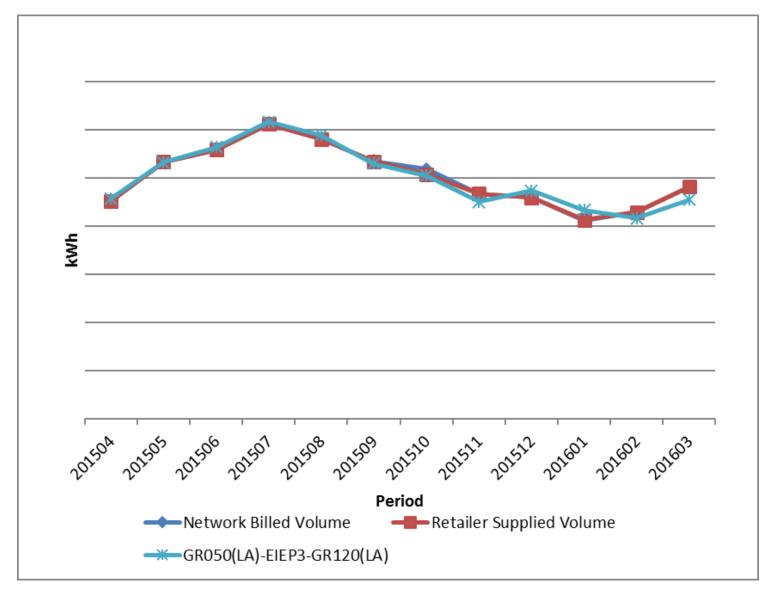
## JC The Good



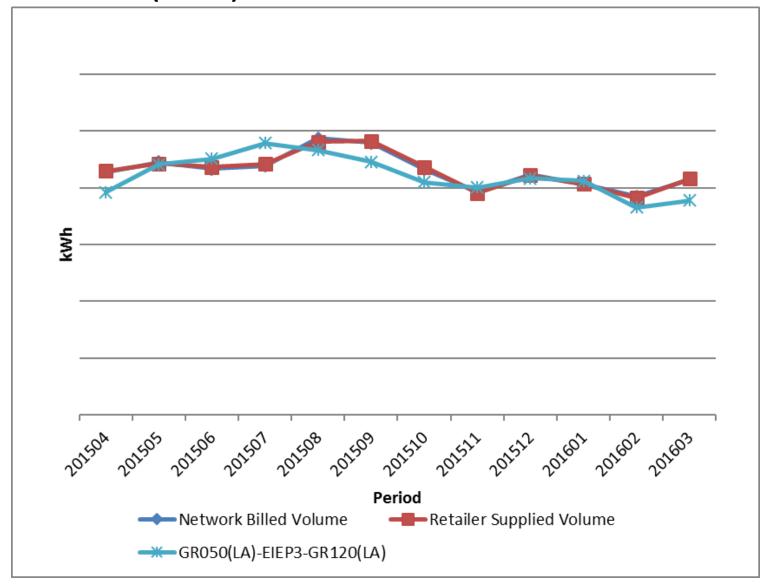
## JC The Good



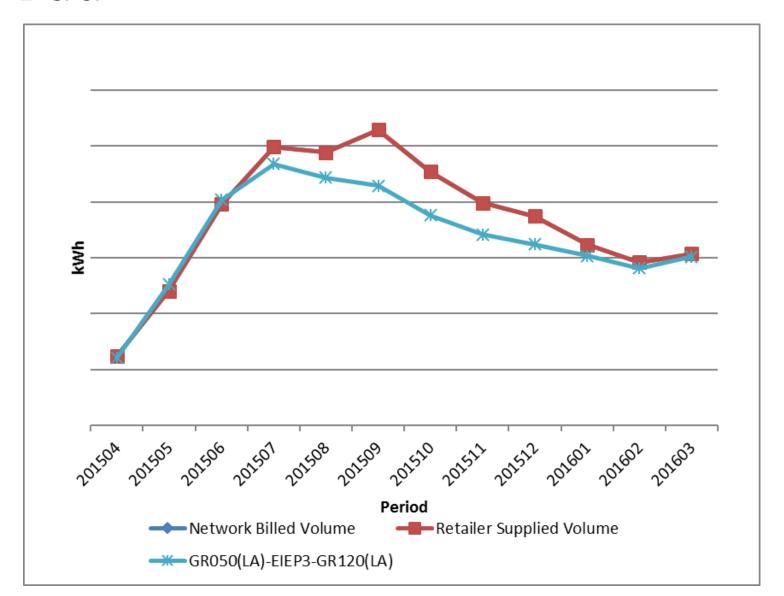
## JC The Good



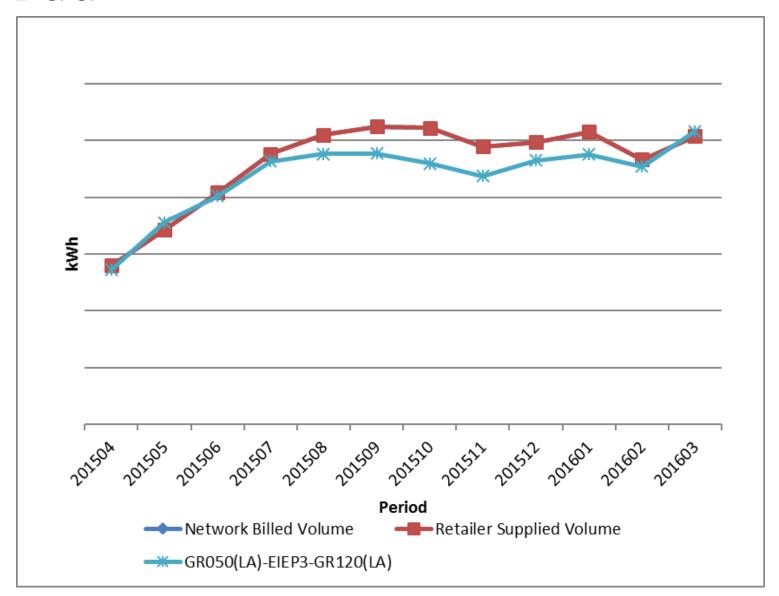
## The Good (ish)



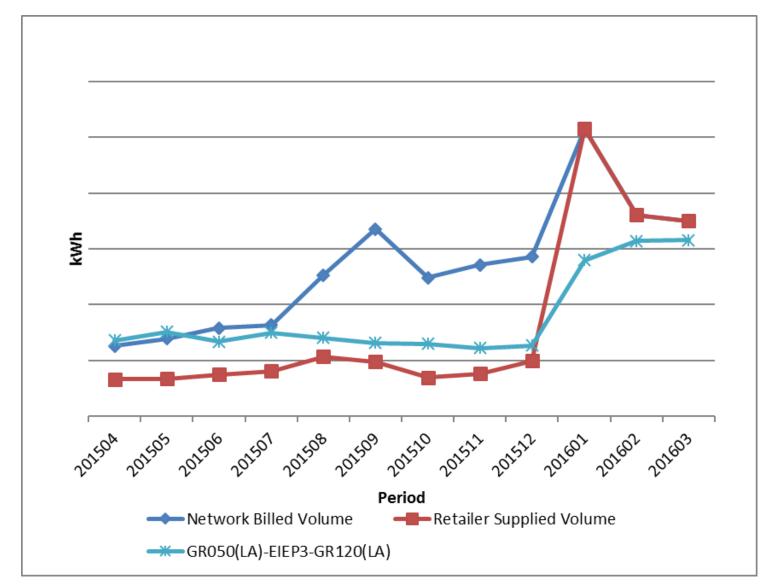
## JC The Bad



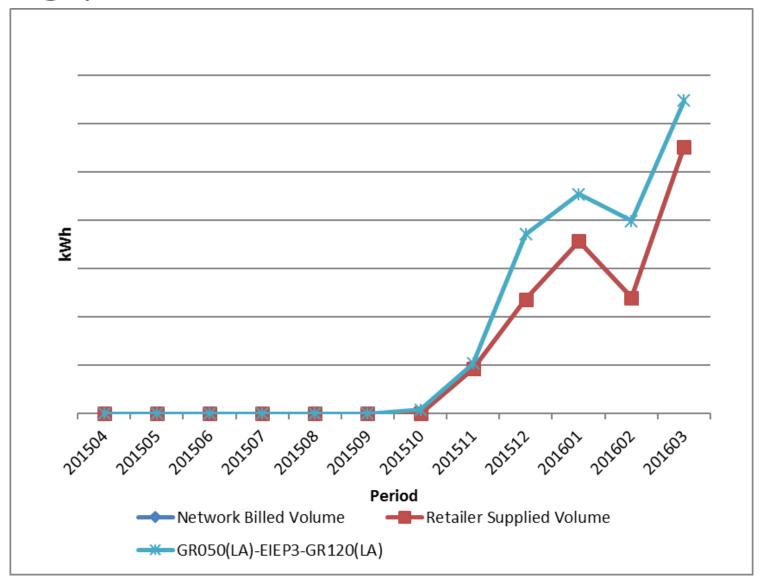
## JC The Bad



## JC The Ugly



## JC The Ugly



### Conclusions

- You can! (reconcile market data with line charge data)
- Generally the majority of the lines charge volumes agreed with the Market volumes to within an acceptable tolerance for NPOW (0.5%).
- There are a few participants that should be looked at harder as they may be not submitting all the market volume they should.
- There are a small number of generally new entrant retailers who's data (and systems) really need improving.



## Observations

- Well done Replacement Normalised data is just as good as well done Incremental Normalised data.
- We will be repeating this exercise shortly, hopefully there has been an improvement.