

ELECTRICITY INDUSTRY PARTICIPATION CODE
DISTRIBUTED UNMETERED LOAD AUDIT REPORT

The logo for Veritek, featuring the word "VERITEK" in a blue serif font. A vertical blue line is positioned to the left of the text, and a horizontal blue line is positioned below the text, intersecting at the letter 'V'.

For

METLIFECARE GREENWOOD RETIREMENT
VILLAGE TAURANGA
AND CONTACT ENERGY

Prepared by: Rebecca Elliot

Date audit commenced: 2 August 2021

Date audit report completed: 13 December 2021

Audit report due date: 26-Aug-21

TABLE OF CONTENTS

Executive summary	3
Audit summary	4
Non-compliances	4
Recommendations	4
Issues 4	
1. Administrative	5
1.1. Exemptions from Obligations to Comply with Code	5
1.2. Structure of Organisation	5
1.3. Persons involved in this audit.....	6
1.4. Hardware and Software	6
1.5. Breaches or Breach Allegations.....	6
1.6. ICP Data	6
1.7. Authorisation Received	6
1.8. Scope of Audit	6
1.9. Summary of previous audit	7
1.10. Distributed unmetered load audits (Clause 16A.26 and 17.295F)	8
2. DUML database requirements.....	9
2.1. Deriving submission information (Clause 11(1) of Schedule 15.3)	9
2.2. ICP identifier and items of load (Clause 11(2)(a) and (aa) of Schedule 15.3)	9
2.3. Location of each item of load (Clause 11(2)(b) of Schedule 15.3)	10
2.4. Description and capacity of load (Clause 11(2)(c) and (d) of Schedule 15.3)	10
2.5. All load recorded in database (Clause 11(2A) of Schedule 15.3)	11
2.6. Tracking of load changes (Clause 11(3) of Schedule 15.3)	11
2.7. Audit trail (Clause 11(4) of Schedule 15.3).....	11
3. Accuracy of DUML database	13
3.1. Database accuracy (Clause 15.2 and 15.37B(b))	13
3.2. Volume information accuracy (Clause 15.2 and 15.37B(c))	13
Conclusion	15
Participant response	16

EXECUTIVE SUMMARY

This audit of the **Metlifecare Greenwood Retirement Village (Greenwood)** Unmetered Streetlights DUML database and processes was conducted at the request of **Meridian Energy Limited (Meridian)**, in accordance with clause 15.37B. The purpose of this audit is to verify that the volume information is being calculated accurately, and that profiles have been correctly applied.

The audit was conducted in accordance with the audit guidelines for DUML audits version 1.1.

The Greenwood database switched to Meridian on April 1st, 2021. This database was previously being reconciled by Contact Energy (CTCT) and the last audit report was submitted late to the Electricity Authority by them.

This audit report has been submitted late due to COVID-19 restrictions that prevented the field audit being carried out.

Meridian has an excel spreadsheet to track the lamps at Greenwood. A 100% field audit was undertaken on 6th December 2021 and found the database to be accurate.

Meridian reconciles this DUML load using the RPS profile and are using the registry information, which is updated to match the database kW multiplied by an estimated 11.5 hours per day. The methodology is correct.

The audit found only one non-compliance. The database switched into Meridian from 1 April 2021, but the daily kWh figure was not updated to match the spreadsheet values until 21 July 2021 due to an oversight. Corrections will flow through the revision process to correct the volumes for the months from April 2021 to July 2021.

The future risk rating of one indicates that the next audit be completed in 24 months. I recommend that the next audit is conducted in 36 months for the following reasons:

- the field audit confirmed that the database is accurate,
- the one non-compliance has been cleared as Meridian have corrected the daily kWh figure and backdated to the ICPs switch in date, and
- the database is static, and no changes are expected to occur for the foreseeable future.

The one matter raised is detailed in the table below.

AUDIT SUMMARY

NON-COMPLIANCES

Subject	Section	Clause	Non-Compliance	Controls	Audit Risk Rating	Breach Risk Rating	Remedial Action
Volume information accuracy	3.2	15.2 & 15.37B(c)	Registry had the incorrect daily kWh value from 01/04/2021 to 21/07/21.	Strong	Low	1	Cleared
Future Risk Rating						1	

Future risk rating	0	1-4	5-8	9-15	16-18	19+
Indicative audit frequency	36 months	24 months	18 months	12 months	6 months	3 months

RECOMMENDATIONS

Subject	Section	Description	Remedial Action
		Nil	

ISSUES

Subject	Section	Description	Issue
		Nil	

1. ADMINISTRATIVE

1.1. Exemptions from Obligations to Comply with Code

Code reference

Section 11 of Electricity Industry Act 2010.

Code related audit information

Section 11 of the Electricity Industry Act provides for the Electricity Authority to exempt any participant from compliance with all or any of the clauses.

Audit observation

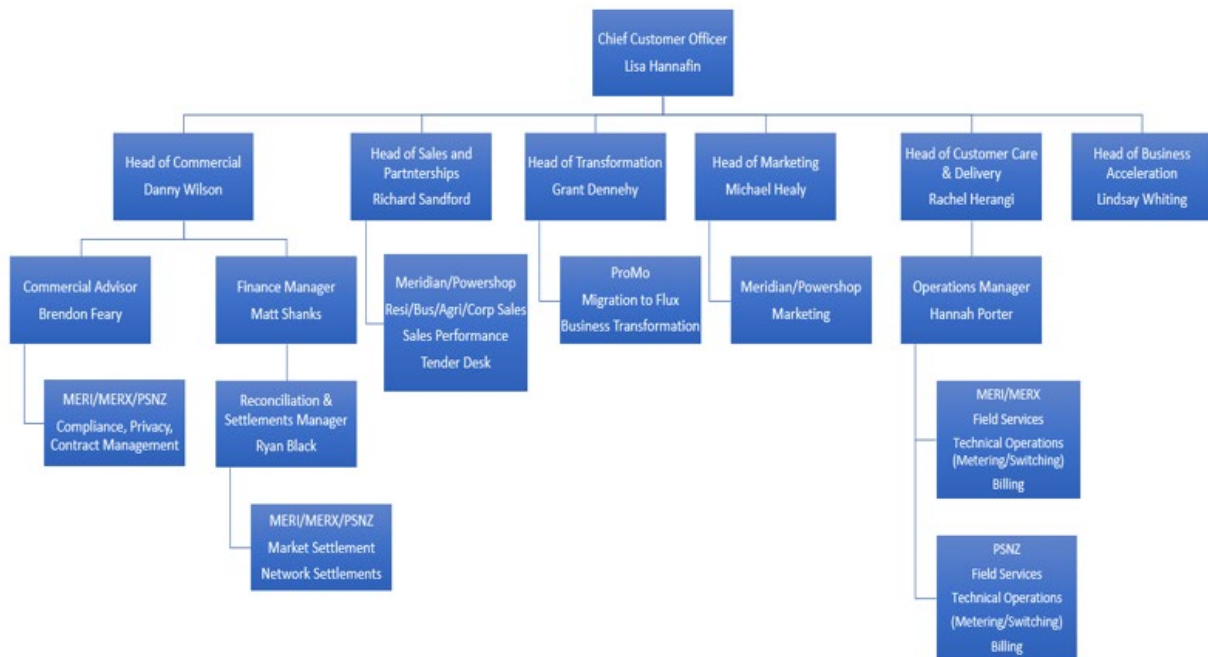
Section 11 of the Electricity Industry Act provides for the Electricity Authority to exempt any participant from compliance with all or any of the clauses.

Audit commentary

There are no exemptions in place relevant to the scope of this audit.

1.2. Structure of Organisation

Meridian provided a copy of their organisational structure:



1.3. Persons involved in this audit

Auditor:

Name	Title
Rebecca Elliot	Auditor

Other personnel assisting in this audit were:

Name	Title	Company
Amy Cooper	Compliance Officer	Meridian Energy

1.4. Hardware and Software

The streetlight data is held in an excel spreadsheet. This is backed up in accordance with standard industry procedures. Access to the spreadsheet is restricted by way of user log into the computer drive.

1.5. Breaches or Breach Allegations

There are no breach allegations relevant to the scope of this audit.

1.6. ICP Data

ICP Number	Description	Profile	Database number of items of load	Database wattage (watts)
0000544421TU1DA	GREENWOOD PARK LANE ST LIGHTS	RPS	148	3,552
Total			148	3,552

1.7. Authorisation Received

All information was provided directly by Meridian.

1.8. Scope of Audit

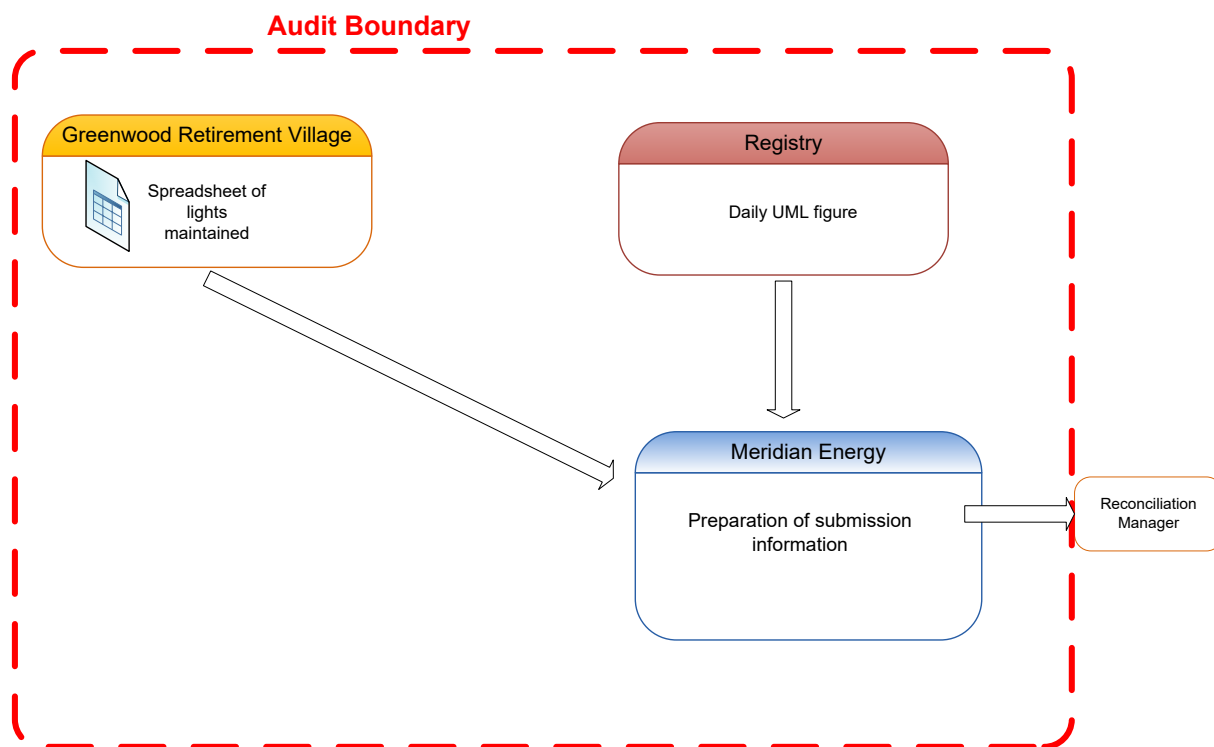
This audit of the Metlifecare Greenwood Retirement Village DUMML database and processes was conducted at the request of Meridian, in accordance with clause 15.37B. The purpose of this audit is to verify that the volume information is being calculated accurately, and that profiles have been correctly applied.

The audit was conducted in accordance with the audit guidelines for DUMML audits version 1.1.

An excel spreadsheet is in place to track the lamps at Greenwood. The information from this is updated in the registry and this is being used for submission.

Any changes made to the field are updated in the spreadsheet maintained by the Village Manager and these updates are expected to be provided to Meridian as changes occur.

The scope of the audit encompasses the collection, security and accuracy of the data, including the preparation of submission information based on the spreadsheet reporting. The diagram below shows the audit boundary for clarity.



100% field audit was undertaken of the Greenwood Village streetlights was undertaken on 6th December 2021.

1.9. Summary of previous audit

The previous audit was conducted in March 2021 for Contact Energy and was conducted by Steve Woods of Veritek Limited. The table below details the current status of that audit’s non-compliances.

Subject	Section	Clause	Non-Compliance	Status
Distributed unmetered load audits	1.10	16A.26 and 17.295F	DUML audit not completed within the required timeframe.	Cleared
Deriving submission information	2.1	11.1 of schedule 15.3	DUML database is not up to date. 12 additional lights identified by the field audit resulting in under submission by 1,230 kWh per annum.	Cleared
All load recorded in database	2.5	11(2A) of Schedule 15.3	12 additional items of load found in the field not recorded in the database.	Cleared

Subject	Section	Clause	Non-Compliance	Status
Database Accuracy	3.1	15.2 and 15.37B(b)	12 additional items of load found in the field that would result in an estimated under submission of 1,230 kWh per annum.	Cleared
Volume information accuracy	3.2	15.2 & 15.37B(c)	DUML database is not up to date. 12 additional lights identified by the field audit resulting in under submission by 1,230 kWh per annum.	Cleared

1.10. Distributed unmetered load audits (Clause 16A.26 and 17.295F)

Code reference

Clause 16A.26 and 17.295F

Code related audit information

Retailers must ensure that DUML database audits are completed:

1. by 1 June 2018 (for DUML that existed prior to 1 June 2017)
2. within three months of submission to the reconciliation manager (for new DUML)
3. within the timeframe specified by the Authority for DUML that has been audited since 1 June 2017.

Audit observation

Meridian have requested Veritek to undertake this streetlight audit.

Audit commentary

This audit report confirms that the requirement to conduct an audit has been met for this database, but it was not completed by August 26th due to COVID 19 pandemic travel restrictions, therefore I have recorded compliance as this was beyond Meridian's control.

Audit outcome

Compliant

2. DUMML DATABASE REQUIREMENTS

2.1. Deriving submission information (Clause 11(1) of Schedule 15.3)

Code reference

Clause 11(1) of Schedule 15.3

Code related audit information

The retailer must ensure the:

- *DUMML database is up to date*
- *methodology for deriving submission information complies with Schedule 15.5.*

Audit observation

The process for calculation of consumption was examined and the application of profiles was checked. The database was checked for accuracy.

Audit commentary

Meridian reconciles this DUMML load using the RPS profile and are using the registry information, which is updated to match the database kW multiplied by an estimated 11.5 hours per day. The methodology is correct.

The field audit confirmed that the database is up to date. The accuracy of submissions is detailed in **section 3.2**.

Audit outcome

Compliant

2.2. ICP identifier and items of load (Clause 11(2)(a) and (aa) of Schedule 15.3)

Code reference

Clause 11(2)(a) and (aa) of Schedule 15.3

Code related audit information

The DUMML database must contain:

- *each ICP identifier for which the retailer is responsible for the DUMML*
- *the items of load associated with the ICP identifier.*

Audit observation

The database was checked to confirm an ICP was recorded.

Audit commentary

The database has only one ICP associated with it, and this is recorded in the spreadsheet.

outcome

Compliant

2.3. Location of each item of load (Clause 11(2)(b) of Schedule 15.3)

Code reference

Clause 11(2)(b) of Schedule 15.3

Code related audit information

The DUMML database must contain the location of each DUMML item.

Audit observation

The database was checked to confirm the location is recorded for all items of load.

Audit commentary

The database has a field for street name, location description for all items of load, and GPS coordinates for all but 12 items of load. The descriptions are sufficient to locate them.

Audit outcome

Compliant

2.4. Description and capacity of load (Clause 11(2)(c) and (d) of Schedule 15.3)

Code reference

Clause 11(2)(c) and (d) of Schedule 15.3

Code related audit information

The DUMML database must contain:

- *a description of load type for each item of load and any assumptions regarding the capacity*
- *the capacity of each item in watts.*

Audit observation

The database was checked to confirm that it contained a field for lamp type and wattage capacity and included any ballast or gear wattage and that each item of load had a value recorded in these fields.

Audit commentary

The database contains a lamp description, lamp wattage and lamp ballast fields. These fields are populated for every item in the spreadsheet.

The accuracy of wattage and ballasts in the database is discussed in **section 3.1**.

Audit outcome

Compliant

2.5. All load recorded in database (Clause 11(2A) of Schedule 15.3)

Code reference

Clause 11(2A) of Schedule 15.3

Code related audit information

The retailer must ensure that each item of DUML for which it is responsible is recorded in this database.

Audit observation

A 100% field audit was undertaken on 6th December 2021.

Audit commentary

The field audit found no additional items of load. The additional items of load identified in the last audit have been added to the database by Contact prior to it switching to Meridian.

The accuracy of the database is detailed in **section 3.1**.

Audit outcome

Compliant

2.6. Tracking of load changes (Clause 11(3) of Schedule 15.3)

Code reference

Clause 11(3) of Schedule 15.3

Code related audit information

The DUML database must track additions and removals in a manner that allows the total load (in kW) to be retrospectively derived for any given day.

Audit observation

The process for tracking of changes in the database was examined.

Audit commentary

The maintenance of the Greenwood Village lights is managed privately. The Village Manager provides updates in relation to these lights as they occur and Meridian maintains separate versions of the spreadsheet to show the changes.

Audit outcome

Compliant

2.7. Audit trail (Clause 11(4) of Schedule 15.3)

Code reference

Clause 11(4) of Schedule 15.3

Code related audit information

The DUML database must incorporate an audit trail of all additions and changes that identify:

- *the before and after values for changes*
- *the date and time of the change or addition*
- *the person who made the addition or change to the database.*

Audit observation

The spreadsheet was checked for audit trails.

Audit commentary

The spreadsheet has a complete audit trail.

Audit outcome

Compliant

3. ACCURACY OF DUML DATABASE

3.1. Database accuracy (Clause 15.2 and 15.37B(b))

Code reference

Clause 15.2 and 15.37B(b)

Code related audit information

Audit must verify that the information recorded in the retailer's DUML database is complete and accurate.

Audit observation

A 100% field audit was undertaken of the spreadsheet.

Wattages were checked for alignment with the published standardised wattage table produced by the Electricity Authority.

Audit commentary

The 100% field audit confirmed the database was accurate.

Wattages for all items of load were checked against the published standardised wattage table produced by the Electricity Authority and found to be correct.

Audit outcome

Compliant

3.2. Volume information accuracy (Clause 15.2 and 15.37B(c))

Code reference

Clause 15.2 and 15.37B(c)

Code related audit information

The audit must verify that:

- *volume information for the DUML is being calculated accurately*
- *profiles for DUML have been correctly applied.*

Audit observation

The submission was checked for accuracy for the month the spreadsheet was supplied. This included:

- checking the registry to confirm that the ICP has the correct profile and submission flag, and
- checking the database extract combined with the burn hours against the submitted figure to confirm accuracy.

Audit commentary

Meridian reconciles this DUML load using the RPS profile and are using the registry information, which is updated to match the database kW multiplied by an estimated 11.5 hours per day.

The database switched into Meridian from 1 April 2021, but the daily kWh figure was not updated to match the spreadsheet values until 21 July 2021. Corrections will flow through the revision process to correct the volumes for the months from April 2021 to July 2021. This is recorded as non-compliance.

Audit outcome

Non-compliant

Non-compliance	Description		
Audit Ref: 3.2 With: Clause 15.2 & 15.37B(c) From: 01-Apr-21 To: 21-Jul-21	Registry had the incorrect daily kWh value from 01/04/2021 to 21/07/21. Potential impact: Low Actual impact: Low Audit history: Twice previously Controls: Strong Breach risk rating: 1		
Audit risk rating	Rationale for audit risk rating		
Low	The controls are recorded as strong as Meridian’s controls mitigate risk to an acceptable level. The impact on settlement and participants is low and the volumes will be corrected through the revision process for the months affected.		
Actions taken to resolve the issue		Completion date	Remedial action status
The daily kWh used for settlement was corrected with an event date of 01/04/2021 and revisions for all impacted months (April – July 21) are now complete.		30/11/2021	Cleared
Preventative actions taken to ensure no further issues will occur		Completion date	
No comment provided			

CONCLUSION

The Greenwood database switched to Meridian on April 1st, 2021. This database was previously being reconciled by Contact Energy (CTCT) and the last audit report was submitted late to the Electricity Authority by them.

This audit report has been submitted late due to COVID-19 restrictions that prevented the field audit being carried out.

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- the field audit confirmed that the database is accurate,
- the one non-compliance has been cleared as Meridian have corrected the daily kWh figure and backdated to the ICPs switch in date, and
- the database is static, and no changes are expected to occur for the foreseeable future.

PARTICIPANT RESPONSE

Meridian have reviewed this report and their comments are recorded in the report. No further comments were provided.