

Attachment A - Current BSC Process for Revenue Protection Adjustments

Revenue Protection Adjustments (Non Half Hourly)

The process is defined in BSCP504 'Non Half Hourly Data Collection for SVA Metering Systems Registered in SMRS', 3.6 'Revenue Protection'.

Ref.	When	Action	Who
3.6.1	When informed by the Revenue Protection Service that there is evidence of tampering with a SVA Metering System	Record an adjustment to the meter advance based on the unrecorded units estimated by the Revenue Protection Service.	NHHDC
3.6.2	After 3.6.1 occurs	Calculate a new EAC and AA based on the adjusted meter advance and send the new EAC/AA	NHHDC to NHHDA and Supplier (D0019 'Metering System EAC/AA Data')

NOTES

- It is assumed that Revenue Protection adjustments are notified by the Revenue Protection Service (RPS) to the NHHDC, whereas in practice, notification is usually via the Supplier. The BSCP makes no reference to any interaction between the RPS and the Supplier.
- DTC flows from the RPS to the Supplier are not referenced by the BSCP i.e.
 - Revenue Protection Service Statistical Report (D0236).
 - Notification by Revenue Protection Service of Possible Irregularity (D0237).
 - Revenue Protection Report on Action Taken (D0239) (also to MOP).
- In practice, two methods are used to make the adjustment – add the missing units to the meter advance without amending the meter readings or to adjust the reading. These are described in Appendix 1, which sets out the pros and cons of these methods.
- The requirement to maintain an audit trail is a generic one – 'The Market Participant shall ensure that all processes which affect Settlement shall be verifiable' (PSL100 9.1.1).
- Revenue Protection adjustments are auditable at a transaction level – i.e. the NHHDC should be able to demonstrate that an individual adjustment has been made. However, adjustments are not separately identifiable by NHH Data Aggregators or the Supplier Volume Allocation Agent (SVAA). So there is no overall view of how many stolen units have been accounted for in Settlement.
- Where stolen units are not accounted for by the BSCP504 process, they will be allocated via GSP Group Correction.

Revenue Protection Adjustments (Half Hourly)

The process is defined in BSCP502 'Half Hourly Data Collection for SVA Metering Systems Registered in SMRS', 4.2 'Data Estimation' –

"When the HHDC receives information from the MOA, Revenue Protection Service, site reports or other sources concerning metered data which has been or will be collected and processed, the Meter Period Value data shall be estimated in accordance with this BSCP where the HHDC believes the data to be in error. The HHDC shall inform the Supplier where an error might affect a different Supplier or data affects the Final Reconciliation Volume Allocation Run.

The HHDC shall retain any original value collected, whether such value is processed before or after receipt of any details of invalid data from the MOA, Revenue Protection Service, site reports or other source, and any alarms set up at the Meter".

Notification of Suspected Tampering

BSCP504 4.1 defines the site checks to be carried out by NHH Data Collectors. These include –

9. Evidence of tampering with the SVA MS or LDSO equipment, particularly seals
10. Evidence of stopped meters (particularly zero advance on an occupied premises)
11. Evidence of supply being taken when the meters are de-energised

The 'Request and Information for Revenue Protection Investigation' (D0238) from Supplier to RPS is not referred to in the BSCP. NHHDC should send a 'Meter Reading' (D0010) or 'Notification of Failure to Obtain Reading' (D0004) flow with an appropriate Site Visit Check Code (J0024).

BSCP504 4.18 states –

'In particular, controls should be developed to ensure that illegal and dangerous situations concerning SVA Metering Systems are identified, recorded and reported to the relevant parties for further action. An example would be the identification, during a physical inspection to obtain a meter reading, of a meter which has been tampered with'.

Appendix 1 – Revenue Protection Adjustments – Advances v Readings

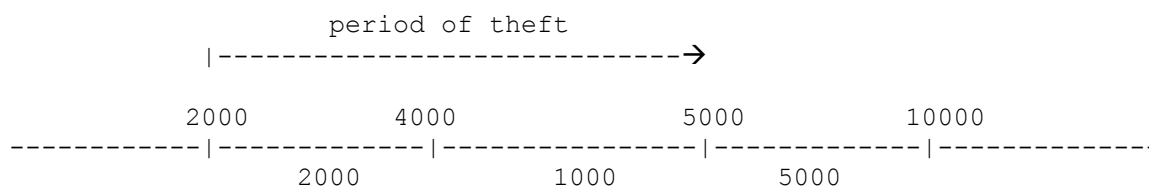
Introduction

The process for applying Non Half Hourly Revenue Protection adjustments in Settlement is defined in BSCP504 3.6 'Revenue Protection'.

The process refers to "an adjustment to the meter advance", but an alternative is to adjust the meter reading and, in practice, we know from our Technical Assurance checks that this alternative approach is taken.

Theft Scenario

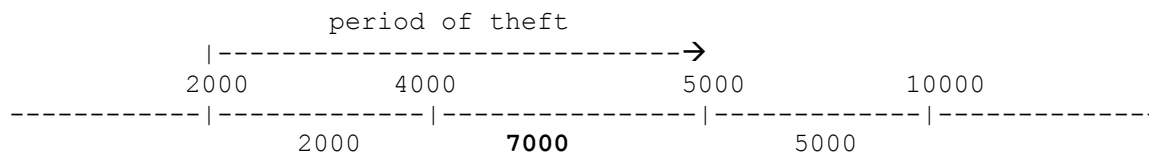
Let us assume that 6000 units are estimated to have been stolen during the period of theft. Meter readings are shown above the line. Meter advances are shown below the line.



The total units that were settled are $2000 + 1000 + 5000 = 8000$

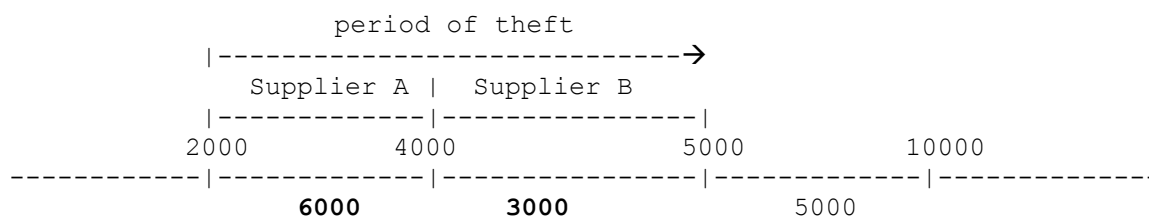
The total units that should have been settled were $8000 + 6000 = 14000$.

Adjusting the Meter Advance



By adding the 6000 units to the 1000 advance, the total energy settled will be correct – $2000 + 7000 + 5000 = 14000$ units. This will work whether the meter is replaced or not.

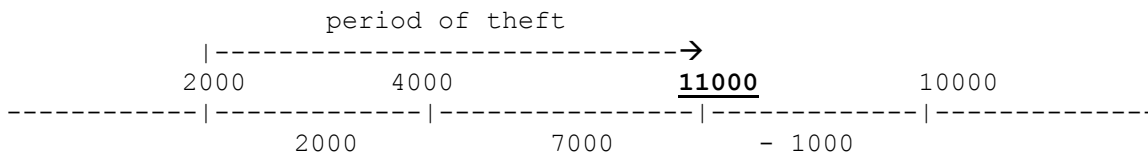
It also works where there is a change of Supplier. As shown below, Supplier A and Supplier B were allocated 2000 and 1000 units respectively. Allocating the 6000 stolen units in the same proportion would mean that Supplier A would be allocated $2000 + 4000 = 6000$ units, Supplier B would be allocated $1000 + 2000 = 3000$ units, and the total energy allocated would be $6000 + 3000 + 5000 = 14000$ units.



The disadvantages of adjusting the meter advance are –

- There is a risk that on change of NHH Data Collector, the new NHHDC will validate the adjusted Annualised Advance against the readings and find a discrepancy. Recalculating the Annualised Advance from the readings will back out the Revenue Protection adjustment.
- Although Suppliers receive both readings and Annualised Advances from the NHHDC, there is nothing on the D0019 flow that will indicate that the AA has been adjusted. LDSOs only receive readings (plus periodic snapshots of EACs on request).

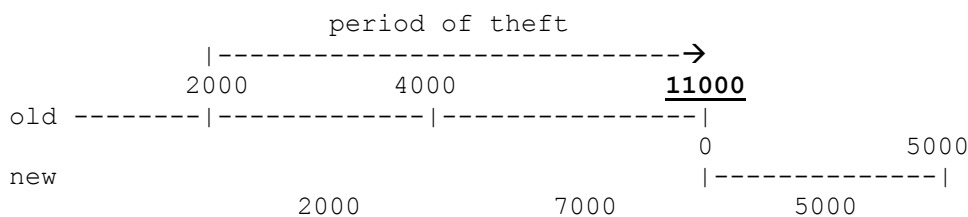
Adjusting the Meter Reading



If you add the 6000 missing units to the reading at the end of theft period to give a reading of 11000, you will correctly allocate 9000 units up to that date. However, the next time the meter is read, there will be a negative advance of 1000 units so only 8000 units will be settled in total.

The disadvantage of adjusting the meter reading is that it doesn't work unless the meter is replaced.

If the meter is replaced, the total units will be 9000 on the old meter plus 5000 on the new meter giving the correct answer of 14000 units.



In the change of Supplier scenario you would need to adjust two readings.

