# Schema Change Request

| | |
|---|---|
| Document ID | **12** |
| Change Type | Enhancement/ New Requirement |
| Title | Changes required for SA/ WA Retail Gas Market (B2B) |
| Date | 29 December, 2003 |
| Prepared By | Brian Eaves, Bibhakar Saran |
| Priority | |

| *Notes* |
|---|

# Document Control

| Version | Date | Author | Summary of Change |
|---|---|---|---|
| 0.1 | 24/10/2003 | Brian Eaves/ Bibhakar Saran | Initial draft of Proposal section |
| 0.2 | 22/12/2003 | Darren Field | Acceptance of changes for final release |
| | | | |
| | | | |
| | | | |

# Document Status

## Sample Change Request Management (CRM) State Descriptions:

| State | Definition | Access Control |
|---|---|---|
| ***Submit Proposal*** | This state occurs as the result of a new Change Request submission. Change Request is placed in the CCB Review queue. No owner assignment takes place as a result of this action. | All Users |
| ***Reject Proposal*** | A Change Request in this state is determined by in the CCB Review Meeting or by the assigned team member to be an invalid request or more information is needed from the submitter. If confirmed invalid, the Change Request will be *Closed* by the CCB and the submitter notified. | |
| ***Closed*** | Change Request no longer requires attention. This is a final state a Change Request can be assigned. | |
| ***Approved Proposal*** | A Change Request is then assigned a baseline and the schedule update, if appropriate. | |
| ***Proposal Assessment*** | This state occurs as the result of update of an existing Change Request with all implementation details, i.e. change log, release notes, dependency analysis. Change Request is placed in the CCB Review queue. | |
| ***Proposal Rejected*** | A Change Request in this state has been ***Rejected*** and needs rework. As a result the Change request can be resubmitted for assessment at ***Proposal Assessment*** state for next iteration or ***Closed***. | |
| ***Proposal Accepted*** | A Change Request in this state has been ***Approved*** and is ready to be published in a draft release. | |
| ***Published*** | Change Request no longer requires attention. This is a final state a Change Request can be assigned. | |

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Nil

# 1. Change Proposal

## 1.1. Description of the proposed change

This section describes the proposed changes from business perspective.

Table 1-1, Proposed Changes

| Item# | Change Description | Change Type |
|---|---|---|
| 1. | Extend DistributionTariff to include new values required | Enhancement |
| 2. | Extend value space for TypeOfRead to include “Deemed” | Enhancement |
| 3. | Adapt the NetworkDUoSBillingNotification transaction to allow for TariffH CSV data for WA. | Enhancement |
| 4. | Extend DistributionTariff to include new values required | Enhancement |
| 5. | Increase length of IndexValue field to 9 digits. This item is yet to be authorised by SA/WA B2BWG for implementation | Enhancement |
| 6. | Extend JobEnquiryCode as per notes below | Enhancement |
| 7. | Add StandingData to the ServiceOrderResponse transaction | Enhancement |

## 1.2. Reason for Change

This section provides justifications for the proposed change.

**Item 1:**

This item has been superseeded as follows based on the email text shown below:

```
Bibhakar

Finally I have received the lists of additional values for the Distribution
Code
(which currently allows only 'Demand' and 'Volume'.  Sorry for the delay.

Brian

WA List. - Information from Aart ter Kuile

The WA List, allowing for some changes expected in the near
future is as follows:

1A1R, 1A2R, 1B1R, 1B2R, 1B3R
1A1N, 1A2N, 1B1N, 1B2N, 1B3N

1D1R, 1D2R, 1D3R
1D1N, 1D2N, 1D3N

1K1R, 1K2R, 1K3R
1K1N, 1K2N, 1K3N
```

1V1R, 1V2R, 1V3R
1V1N, 1V2N, 1V3N

This list differs from the one in the RMR as it includes our tariffs for Albany, Kalgoorlie and the Vines (presently not contestable, but likely

to become so in the future) as well as the imminent change of tariff B1 in it being split into A2 and B1, and the associated renaming of tariff AA to A1, under our Access Arrangement review due in early 2004.

SA List - Information from Michael Nettle

The Distribution Tariff Code list proposed by Envestra is as follows:

1Demand
2Demand
3Demand
4Demand
5Demand
6Demand
7Demand
8Demand
9Demand
0Demand
Commercial
Volume
Negotiated
NegotiatedVolume

**Item 2:**

Rule 148 defines the concept of a 'deemed' meter read as follows:

"If a meter reading for a basic-metered delivery point that generated an actual value was undertaken no more than 10 days before the date of move in, then a meter reading is deemed to have occurred on the day of a move in."

The current allowable entries for TypeOfRead in aseXML are "Actual", "Estimated", "Substituted" and "Customer Own Read". REMCo requests that this be extended to allow for an entry of "Deemed".

**Item 3:**

While the network billing data formats for SA and WA will be largely based on the Victorian transactions, in Western Australia, haulage tariffs are not easily differentiated by 'demand' and 'volume'. WA require that all billing data be provided in a single file.

Rather than using the existing data elements of CSVNetworkDUoSDataTariffD/CSVData and CSVNetworkDUoSDataTariffV/CSVData, REMCo requests that the NetworkDUoSBillingNotification transaction be adapted to allow for TariffH CSV data for WA (ie CSVNetworkDUoSDataTariffH/CSVData.

**Item 4:**

The current length of the Current/IndexValue data element (and associated elements eg Current/MeterData/ Currrent/IndexValue, etc.) is 7 integers. However, South Australia have a number of meters with more than 7 dials. REMCo therefore requests that the length of this data element be increased to 9 digits.

**Item 5:**

The following changes are proposed and implemented in the schema based on the VicGas & SA/WA market participant agreement in the "SAWA Gas B2BWG". Brian's email text is attached below:

Bibhaker,

As discussed on Friday, at the Service Order workshop it was concluded that two new Job Enquiry Codes are required for Western Australia only.

These, together with some information about the business justification are as follows:

"ECO" - Emergency Change Over

When customers are changing from an Electric to a Gas Hot Water Service (and therefore require a new gas service to be connected), the Service Order is treated as high-priority and, therefore processed differently, in WA (hence the use of the term 'emergency' (it is handled by an emergency crew). This is to reduce the risk of the customer staying with electricity. There is no equivalent process in SA or Victoria and, without the use of an additional Job Enquiry Code, no way of capturing the different nature of the transaction. Note: this transaction occurs in reasonably high numbers and would be carried via the hub. This is only be used for residential customers. No additional data elements are required.

"CLT" - Cluster Development

This order would be used to initiate a new connection on a strata titled property. In WA, the User must separately provide "Strata Management Approval" prior to the work being performed by the Network Operator. A different Job Enquiry Code is required to identify this requirement.

I understand that these would be changes to the Schema.

I am happy to provide any further details as required.

Do you think that these can be incorporated into the next draft?

As ever, many thanks for all your help.

Brian

**Item 6:**

The data elements Heating Value Zone, Transmission Zone, and Distribution Tariff are required in the ServiceOrderResponse. It is suggested, these changes be implemented by means of adding optional StandingData element to the ServiceOrderNotiifictionData in ServiceOrderResponse transaction. Version attribute of GasServiceOrderNotiifictionData and ElectricityServiceOrderNotiifictionData is to be changed to r13 as per aseXML guidelines.

## 1.3. Supplied Documents.

### 1.3.1 Business process document

SAWA Retail Market Rules dated 24th October 2003.

SAWA Systems Interface Specification v2.0 dated 26th November 2003.

### 1.3.2 Data model

## 1.4. Impact assessments on Participant's systems

The B2B processes and transactions that will be used in the SA and WA Gas FRC markets will wherever possible be based upon the Gas Interface Protocol developed for Victoria Gas FRC. This will minimize the impact on Participants' systems.

However, a few changes to these transactions and to the aseXML schema are necessary to deal with:

- Specific business practices in SA and WA
- Specific requirements of the REMCo Retail Market Rules (which reflect the above business practices)

These changes have been identified by the SA/WA B2B Working Group.

### 1.4.1 Technical Impact

The technical impact to participants of the SA/ WA markets is that they will need to develop/enhance their systems to support the new schema and business rules.

There should be no technical impact of these changes to participants in other markets outside of SA/ WA. However, participants that decide to upgrade to their schema should follow their internal change procedures to validate that their systems are unaffected by any schema modifications.

## 1.5. Affected Configuration Items (Baseline)

### 1.5.1 Schema

The ASWG has determined that the aseXML r12 will be baseline for the development of the new schema. The changes are required to be included in the R13 schema, scheduled for release on 19/12/2003.

# 2. Approval Proposal

## 2.1. Description of the proposed approval

The table below defines the action in relation to each change item as listed in the Description of the proposed change section.
*Note: Item# is a reference to items listed in the Description of the proposed change. In case, where this list does not exactly match the proposed changes, the items listed are grouped for each proposed change.*
Table 2-1, Proposed Change Approval

| Item# | Proposal Notes | Category | Action |
|---|---|---|---|
| 1. | Extend value space for DistributionTariff to support SA/WA requirements. | "Enhancement" | "Approved", |
| 2. | Extend value space for TypeOfRead to include "Deemed" | "Enhancement" | "Approved", |
| 3. | Adapt the NetworkDUoSBillingNotification transaction to allow for TariffH CSV data for WA. | "Enhancement" | "Approved", |
| 4. | Increase length of IndexValue field to 9 digits | "Enhancement" | "Withdrawn' (See section 4) |
| 5. | Extend JobEnquiryCode as per notes below | "Enhancement" | "Approved", |
| 6. | Add StandingData to the ServiceOrderResponse transaction | "Enhancement" | "Approved", |

## 2.2. Configuration Items (New Baseline)

The ASWG establishes a new baseline as a result of the Change Proposal approval and publishes the listed "Draft" documents for wider consultation with market participants.

### 2.2.1 Draft schema

The Originator provides the modified schema, proposed for consideration, containing proposed changes based on the recommended baseline as defined in section 0 above.

### 2.2.2 Schema change description

Modify Gas_r12.xsd to extend the list of enumerations for the simpleType DistributionTariff, JobEnquiryCode and TypeOfRead.

```
<xsd:simpleType name="DistributionTariff">
        <xsd:annotation>
            <xsd:documentation>Schema - Gas</xsd:documentation>
        </xsd:annotation>
        <xsd:restriction base="xsd:string">
            <xsd:enumeration value="Demand"/>
            <xsd:enumeration value="Volume"/>
            <xsd:enumeration value="1A1R"/>
            <xsd:enumeration value="1A2R"/>
            <xsd:enumeration value="1B1R"/>
            <xsd:enumeration value="1B2R"/>
            <xsd:enumeration value="1B3R"/>
            <xsd:enumeration value="1A1N"/>
            <xsd:enumeration value="1A2N"/>
            <xsd:enumeration value="1B1N"/>
            <xsd:enumeration value="1B2N"/>
            <xsd:enumeration value="1B3N"/>
            <xsd:enumeration value="1D1R"/>
            <xsd:enumeration value="1D2R"/>
            <xsd:enumeration value="1D3R"/>
            <xsd:enumeration value="1D1N"/>
```

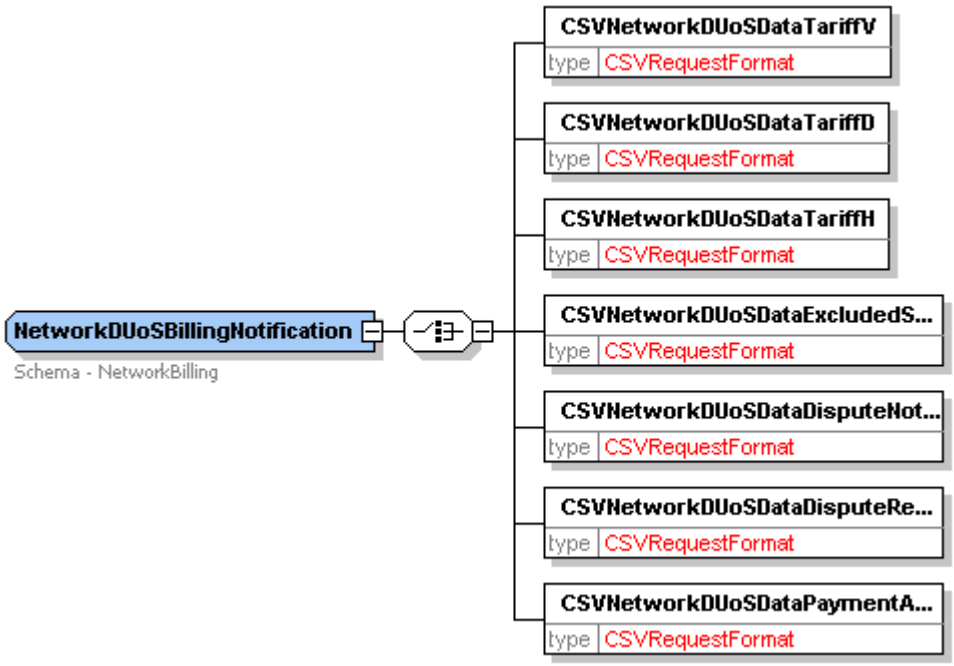
```
            <xsd:enumeration value="1D2N"/>
            <xsd:enumeration value="1D3N"/>
            <xsd:enumeration value="1K1R"/>
            <xsd:enumeration value="1K2R"/>
            <xsd:enumeration value="1K3R"/>
            <xsd:enumeration value="1K1N"/>
            <xsd:enumeration value="1K2N"/>
            <xsd:enumeration value="1K3N"/>
            <xsd:enumeration value="1V1R"/>
            <xsd:enumeration value="1V2R"/>
            <xsd:enumeration value="1V3R"/>
            <xsd:enumeration value="1V1N"/>
            <xsd:enumeration value="1V2N"/>
            <xsd:enumeration value="1V3N"/>
            <xsd:enumeration value="1Demand"/>
            <xsd:enumeration value="2Demand"/>
            <xsd:enumeration value="3Demand"/>
            <xsd:enumeration value="4Demand"/>
            <xsd:enumeration value="5Demand"/>
            <xsd:enumeration value="6Demand"/>
            <xsd:enumeration value="7Demand"/>
            <xsd:enumeration value="8Demand"/>
            <xsd:enumeration value="9Demand"/>
            <xsd:enumeration value="0Demand"/>
            <xsd:enumeration value="Commercial"/>
            <xsd:enumeration value="Negotiated"/>
            <xsd:enumeration value="NegotiatedVolume"/>
        </xsd:restriction>
    </xsd:simpleType>
    <xsd:simpleType name="TypeOfRead">
        <xsd:annotation>
            <xsd:documentation>Schema - Gas</xsd:documentation>
        </xsd:annotation>
        <xsd:restriction base="xsd:string">
            <xsd:enumeration value="Actual"/>
            <xsd:enumeration value="Estimated"/>
            <xsd:enumeration value="Substituted"/>
            <xsd:enumeration value="Customer Own Read"/>
            <xsd:enumeration value="Deemed"/>
        </xsd:restriction>
    </xsd:simpleType>

    <xsd:simpleType name="JobEnquiryCode">
        <xsd:annotation>
            <xsd:documentation>Schema - Gas</xsd:documentation>
        </xsd:annotation>
        <xsd:restriction base="xsd:string">
            <xsd:enumeration value="AML"/>
            <xsd:enumeration value="CSL"/>
            <xsd:enumeration value="CLT"/>
            <xsd:enumeration value="DFC"/>
            <xsd:enumeration value="DSD"/>
            <xsd:enumeration value="EBD"/>
            <xsd:enumeration value="EBS"/>
            <xsd:enumeration value="ECO"/>
            <xsd:enumeration value="EFB"/>
            <xsd:enumeration value="EMG"/>
            <xsd:enumeration value="EMT"/>
            <xsd:enumeration value="EOT"/>
            <xsd:enumeration value="ESE"/>
            <xsd:enumeration value="EST"/>
            <xsd:enumeration value="EXP"/>
            <xsd:enumeration value="FAP"/>
            <xsd:enumeration value="FAT"/>
            <xsd:enumeration value="FHS"/>
            <xsd:enumeration value="FMN"/>
            <xsd:enumeration value="FMT"/>
            <xsd:enumeration value="FSV"/>
            <xsd:enumeration value="MAP"/>
            <xsd:enumeration value="MBO"/>
            <xsd:enumeration value="MCH"/>
```

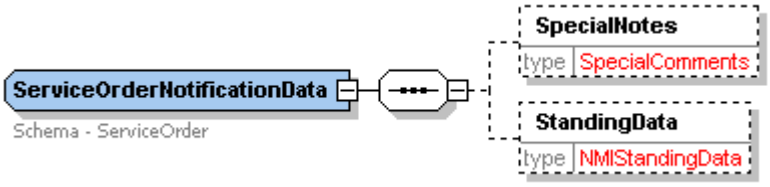
```
            <xsd:enumeration value="MDM"/>
            <xsd:enumeration value="MDO"/>
            <xsd:enumeration value="MFX"/>
            <xsd:enumeration value="MFXA"/>
            <xsd:enumeration value="MHA"/>
            <xsd:enumeration value="MRC"/>
            <xsd:enumeration value="MRF"/>
            <xsd:enumeration value="MRG"/>
            <xsd:enumeration value="MRM"/>
            <xsd:enumeration value="MRR"/>
            <xsd:enumeration value="MRT"/>
            <xsd:enumeration value="MST"/>
            <xsd:enumeration value="MTE"/>
            <xsd:enumeration value="MTJ"/>
            <xsd:enumeration value="MTN"/>
            <xsd:enumeration value="OTH"/>
            <xsd:enumeration value="RML"/>
            <xsd:enumeration value="RSD"/>
            <xsd:enumeration value="RSR"/>
            <xsd:enumeration value="SBS"/>
            <xsd:enumeration value="SCR"/>
            <xsd:enumeration value="SDR"/>
            <xsd:enumeration value="SNG"/>
            <xsd:enumeration value="SPN"/>
            <xsd:enumeration value="UEF"/>
            <xsd:enumeration value="UMS"/>
            <xsd:enumeration value="USR"/>
        </xsd:restriction>
    </xsd:simpleType>
```

Modify NetworkBilling_r12.xsd to include TariffH as follows:

```
    <xsd:complexType name="NetworkDUoSBillingNotification">
        <xsd:annotation>
            <xsd:documentation>Schema - NetworkBilling</xsd:documentation>
        </xsd:annotation>
        <xsd:choice>
            <xsd:element name="CSVNetworkDUoSDataTariffV" type="CSVRequestFormat"/>
            <xsd:element name="CSVNetworkDUoSDataTariffD" type="CSVRequestFormat"/>
            <xsd:element name="CSVNetworkDUoSDataTariffH" type="CSVRequestFormat"/>
            <xsd:element name="CSVNetworkDUoSDataExcludedServices" type="CSVRequestFormat"/>
            <xsd:element name="CSVNetworkDUoSDataDisputeNotification" type="CSVRequestFormat"/>
            <xsd:element name="CSVNetworkDUoSDataDisputeResolution" type="CSVRequestFormat"/>
            <xsd:element name="CSVNetworkDUoSDataPaymentAdvice" type="CSVRequestFormat"/>
        </xsd:choice>
        <xsd:attribute name="version" type="r13" use="required"/>
    </xsd:complexType>
```




Modify NetworkBilling_r12.xsd to include TariffH as follows:




### 2.2.3 Change log

| Chg. No | Description | FileName | Item# |
|---|---|---|---|
| 1 | Changed definition of simple type *DistributionTariff* to include additional enumerations | Gas | 1 |
| 2 | Changed definition of simple type *TypeOfRead* to include additional enumeration of “Deemed” | Gas | 2 |
| 3 | Added new sub transaction element “CSVNetworkDUoSDataTariffH” of type *CSVRequestFormat* to *NetworkDUoSBillingNotification* | NetworkBilling | 3 |
| 4 | Add JobEnquiryCodes “ECO” and “CLT” to enumerated JobEnquiryCode list | Gas | 5 |
| 5 | Add NMIStandingData abstract type to ServiceOrderNotificationData complex type | ServiceOrder | 6 |

The proposed “CR#13_Draft2” changes to the schema are to be included/merged in the draft release of the aseXML R13 subjected to acceptance of the change requests.

### 2.2.4 Dependency analysis

ASWG completes the dependency analysis and verifies the changes with the documentation provided.

# 3. Proposal Assessment

## 3.1. Test

The ASWG ensures that all recommended parsers on relevant platforms can successfully validate the proposed schema.

### 3.1.1 Test Platforms

Samples have been tested using the following parsers:

- MSXML 4.0 SP1
- Xerces 1.4.4
- Xerces 2.2.1
- XMLSpy 4.3

### 3.1.2 Test Cases

Given the nature of the change, i.e. extension to the enumerated list and addition of a CSV wrapper, no test cases are provided for items 1-5 included in this change request. The following files were updated as a result of adding optional StandingData element:

ServiceOrderResponse(Completion)_r13.xml

ServiceOrderResponse(Initial)_r13.xml

ServiceOrderResponse(NoAccess)_r13.xml

SO.Response.DEENERGISE_r13c_a.xml

SO.Response.DEENERGISE_r13c_m.xml

SO.Response.DEENERGISE_r13_vic_a.xml

SO.Response.DEENERGISE_r13_vic_m.xml

SpecialReadResponse(NoAccess)_r13.xml

SpecialReadResponse_r13.xml

## 3.2. Dependency analysis

| Item # | Transactions Impacted[1] | Derived Types Impacted[2] | Schema Filename | Modified Types |
|---|---|---|---|---|
| 1 | Nil | GasStandingData<br>GasStandingDataUpdate<br>GasMeterNotification/MeterFix<br>GasMeterNotification/MIRNStatusUpdate | Gas*.xsd | DistributionTariff |
| 2 | Nil | GasStandingData<br>GasStandingDataUpdate<br>GasMeterNotification/MeterFix<br>GasMeterNotification/MIRNStatusUpdate<br>GasMeterVerifyRequestData<br>GasMeterVerifyResponseData<br>GasServiceOrderNotificationData | Gas*.xsd | TypeOfRead |
| 3 | NetworkDUoSBillingNotification | Nil | NetworkBilling*.xsd | NetworkDUoSBillingNotification |
| 5 | Nil | GasServiceOrderType | Gas*.xsd | JobEnquiryCode |
| 6 | ServiceOrderResponse | Nil | ServiceOrder*.xsd | ServiceOrderNotificationData |

[1] This column identifies the transactions that will require an upgrade of the version attribute
[2] This column identifies the derived types that will require an upgrade of the version attribute

## 3.3.

## 3.4. Conformance Report

The ASWG completes the conformance report validating each proposed change against the published aseXML guidelines.
*Note: Item# is a reference to items listed in the Description of the proposed approval.*

Table 3-1, Change Proposal Conformance Details

| Schema Filename | Impacted by Item # | Conformance Details |
|---|---|---|
| Gas_r*.xsd | 1, 2, 5 | Conforms |
| NetworkBilling_r*.xsd | 3 | Conforms |
| ServiceOrder*.xsd | 6 | Conforms |

# 4. Review Disposition

The ASWG assists developers with schema related queries and confirms appropriateness of development against criteria.

## 4.1. Description of Changes - Approved and Accepted

Table 4-1, Review Notes for proposed approvals

| Item# | Review Notes | Status |
|---|---|---|
| 4 | Change to IndexValue requirement under investigation. May not require change. | Deferred |
| 4 | Requirement for change to IndexValue has been investigated and is not required at this time. | Withdrawn (25/11/2003) |

Note: Item# is a reference to items listed in the Description of the proposed approval.

## 4.2. Impact assessments on Participant's systems

The ASWG seeks the market participants' input on the expected business and technical impacts.

### 4.2.1 Business Impact

### 4.2.2 Technical Impact

A change to the IndexValue type definition would impact VicGas by possibly requiring a back end validation where a schema validation currently suffices. VicGas would prefer that this change not go ahead unless necessary.

## 4.3. Supplied Documents

See Configuration Items (New Baseline) for details. Once the schema is being reviewed, the draft version of the schema is to be published. The audience and means of publication is decided on a case-by-case basis. The general rule is to promote participant's early access to the proposed changes.

*Note: For the schema to be published, it must be ready for "Approval".*

# 5. Resolution

The ASWG provides a resolution for each change item contained in the Approval Proposal. The resolution is forwarded to the Originator for implementation considerations as required by respective Change Management Process.

## 5.1. Changes Approved and Accepted

The ASWG compiles the list of change items proposed for approval together with their resolution status in the table below.

*Note: Item# is a reference to items listed in the Description of Changes - Approved and Accepted.*

Table 5-1, Change Resolution

| Chg. No | Description | FileName | Item# | Status |
|---|---|---|---|---|
| 1 | Changed definition of simple type *DistributionTariff* to include additional enumerations | Gas | 1 | Approved |
| 2 | Changed definition of simple type *TypeOfRead* to include additional enumeration of “Deemed” | Gas | 2 | Approved |
| 3 | Added new sub transaction element “CSVNetworkDUoSDataTariffH” of type *CSVRequestFormat* to *NetworkDUoSBillingNotification* | NetworkBilling | 3 | Approved |
| 4 | Add JobEnquiryCodes “ECO” and “CLT” to enumerated JobEnquiryCode list | Gas | 5 | Approved |
| 5 | Add NMIStandingData abstract type to ServiceOrderNotificationData complex type | ServiceOrder | 6 | Approved |

Note: Item# is a reference to items listed in the Description of Changes - Approved and Accepted.