IEC TC57 WG16
MAINTENANCE REQUEST

Maintenance notice:

This template needs to be completed and sent to: WG16Part301@iectc57.org

Rules:

All participants in the IEC TC 57 WG16 may issue a Maintenance Request concerning IEC TC 57 WG16 documents, UML models or code components. This document defines the form that is to be used to submit such a request.

General guidelines for the Maintenance Request submission:

- The form is to be completed with all the necessary information.

- All associated documents required for the understanding of the Maintenance Request are to be provided.

- It is highly recommended to provide a presentation describing the use cases and why a change to an existing standard is necessary. Each use case must relate to an ongoing or upcoming project (American, European or National project). Valuable contextual information must be provided such as European regulations or directives, project specifications, and so on.

- If needed the requester can be invited to present their Maintenance Request to IEC TC57 WG16. Failing that an IEC TC57 WG16 member should champion the Maintenance Request so that any questions raised may be immediately resolved.

The IEC TC57 WG16 Convener will inform the submitter when the Maintenance Request is to be reviewed by the WG 16.

The Maintenance Request shall be provided to IEC TC57 WG16 Members and Corresponding Members at least one week prior to its presentation for approval.

The Maintenance Request will be debated within IEC TC57 WG 16 and its Members shall state:

- If the Maintenance Request is to be rejected and the reason of rejection.

- If the Maintenance Request is accepted.

- If the Maintenance Request is accepted with changes.

All decisions shall be obtained through consensus[1].

In all cases, the requester shall be informed of the IEC TC57 WG 16 decision.

Accepted Maintenance Requests, before being implemented in the existing standards, shall be updated in a common excel sheet.

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[1] ISO definition of Consensus: "general agreement, characterized by the absence of sustained opposition to substantial issues by any important part of the concerned interests and by a process that involves seeking to take into account the views of all parties concerned and to reconcile any conflicting arguments".

1 General Information

Date of submission:	20/09/2023
Submitter Name:	Jan Owe
Organisation:	Svenska kraftnät
E-mail:	jan.owe@svk.se
Maintenance Request ID	ebIX® 2022/20
Maintenance Request Version	3
Maintenance Request title	Add the «ACC» ChargeType to ESMP (62325-351).

2 Description of the issue (Business requirements, use cases…)

2.1 Background and UseCases

When exchanging information related to a common grid and supplier billing process between the Grid Company and the Energy Supplier, a central information element is the ChargeType class. The class contains master data needed to calculate the grid fee by the Energy Supplier. The following attributes, already present in 62325-301 are proposed added to the «ACC» ChargeType in ESMP:

1) effectiveDate: DateTime [0..1]
2) terminationDate: DateTime [0..1]
3) factor: String [0..1]
4) type: String [0..1]
5) createdDateTime: DateTime [0..1]
6) lastModifiedDateTime: DateTime [0..1]
7) revisionNumber: String [0..1]
8) status: Status [0..1]
9) description: String [0..1]
10) mRID: String [0..1]
11) name: String [0..1]

Needed associations to the ChargeType will follow, among others in ebIX® MR 2022/022, ebIX® MR 2022/023, ebIX® MR 2022/024 and ebIX® MR 2022/025.

The need for the information in the ChargeType class is among others specified in the ebIX® BRS for Combined grid and supply billing.

3 Possible impacts on profiles (ESMP or profiles based on ESMP)

This MR suggest addition of the «ACC» ChargeType to ESMP.
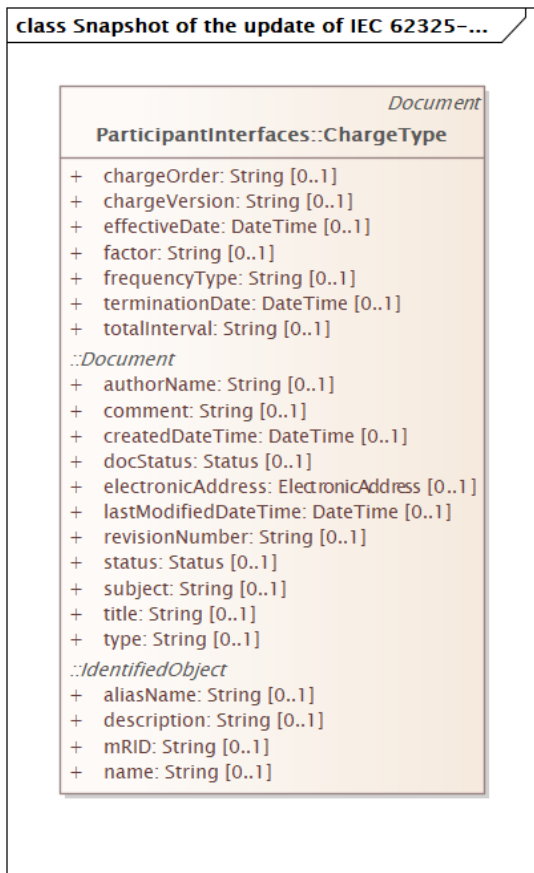
4 Description of the update

4.1 This request applies an update of IEC 62325-301 (If yes, please fill the points below)
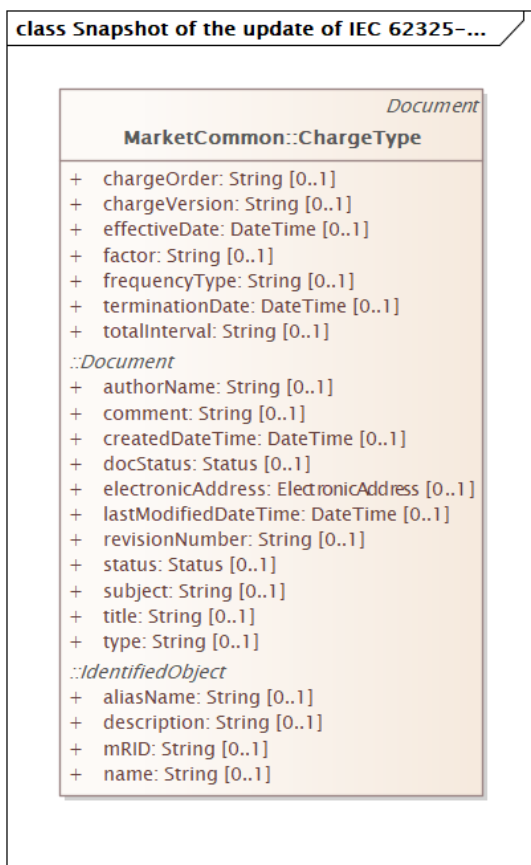
Move the class ChargeType to the MarketCommon package.

4.1.1 Reference to XMI (Optional)

None.

4.1.2 Snapshot of the update in IEC 62325-301 before


```
class Snapshot of the update of IEC 62325-...

                                              Document
              ParticipantInterfaces::ChargeType

   +  chargeOrder: String [0..1]
   +  chargeVersion: String [0..1]
   +  effectiveDate: DateTime [0..1]
   +  factor: String [0..1]
   +  frequencyType: String [0..1]
   +  terminationDate: DateTime [0..1]
   +  totalInterval: String [0..1]
   ::Document
   +  authorName: String [0..1]
   +  comment: String [0..1]
   +  createdDateTime: DateTime [0..1]
   +  docStatus: Status [0..1]
   +  electronicAddress: ElectronicAddress [0..1]
   +  lastModifiedDateTime: DateTime [0..1]
   +  revisionNumber: String [0..1]
   +  status: Status [0..1]
   +  subject: String [0..1]
   +  title: String [0..1]
   +  type: String [0..1]
   ::IdentifiedObject
   +  aliasName: String [0..1]
   +  description: String [0..1]
   +  mRID: String [0..1]
   +  name: String [0..1]
```

4.1.3 Snapshot of the update in IEC 62325-301 after


```
class Snapshot of the update of IEC 62325-...

                                              Document
              MarketCommon::ChargeType

   +  chargeOrder: String [0..1]
   +  chargeVersion: String [0..1]
   +  effectiveDate: DateTime [0..1]
   +  factor: String [0..1]
   +  frequencyType: String [0..1]
   +  terminationDate: DateTime [0..1]
   +  totalInterval: String [0..1]
   ::Document
   +  authorName: String [0..1]
   +  comment: String [0..1]
   +  createdDateTime: DateTime [0..1]
   +  docStatus: Status [0..1]
   +  electronicAddress: ElectronicAddress [0..1]
   +  lastModifiedDateTime: DateTime [0..1]
   +  revisionNumber: String [0..1]
   +  status: Status [0..1]
   +  subject: String [0..1]
   +  title: String [0..1]
   +  type: String [0..1]
   ::IdentifiedObject
   +  aliasName: String [0..1]
   +  description: String [0..1]
   +  mRID: String [0..1]
   +  name: String [0..1]
```

4.2 Description of update of IEC 62325-351 (If yes, please fill the points below)

4.2.1 Description of the change/update

Add the «ACC» ChargeType to ESMP, including the following attributes (already present in 62325-301):

1) effectiveDate: DateTime [0..1]
2) terminationDate: DateTime [0..1]
3) factor: String [0..1]
4) type: String [0..1]
5) createdDateTime: DateTime [0..1]
6) lastModifiedDateTime: DateTime [0..1]
7) revisionNumber: String [0..1]
8) status: Status [0..1]
9) description: String [0..1]
10) mRID: String [0..1]
11) name: String [0..1]

4.2.2 Reference to XMI (Optional)

None.

4.2.3 Snapshot of the update in IEC 62325-351 before

N/A

4.2.4 Snapshot of the update in IEC 62325-351 after
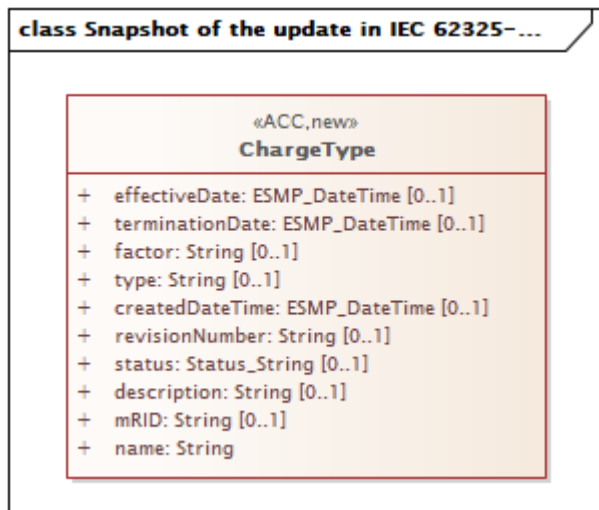
4.2.4.1 Class and attributes descriptions

ChargeType class:

Definition from IEC62325/ MarketOperations/ParticipantInterfaces:

Charge Type is the basic level configuration for settlement to process specific charges for invoicing purpose. Examples such as: Day Ahead Spinning Reserve Default Invoice Interest Charge, etc.

Proposed definition in ESMP:

Charge Type is the basic level configuration for settlement to process specific charges for invoicing purpose.

ChargeType attribute **effectiveDate**:

Definition from IEC62325/MarketOperations/ParticipantInterfaces/effectiveDate:

Charge type effective date.

Proposed definition in ESMP:

The date or date/time when this set of information was derived from the database.

ChargeType attribute **terminationDate**:

Definition from IEC62325/ MarketOperations/ParticipantInterfaces/ChargeType:

Charge type termination date.

Proposed definition in ESMP:

The date from when this charge value-set no longer is valid.

ChargeType attribute **factor**:

Definition from IEC62325/MarketOperations/ParticipantInterfaces/factor:

Adjustment factor.

Proposed definition in ESMP:

The total of all corrections to calculate the billable quantity from the Uncorrected quantity.

ChargeType attribute **type**:

Definition from IEC62325/MarketOperations/ParticipantInterfaces/type:

Utility-specific classification of this document, according to its corporate standards, practices, and existing IT systems (e.g., for management of assets, maintenance, work, outage, customers, etc.).

Proposed definition in ESMP:

The type of charge, such as fee, tariff, or subscription.

ChargeType attribute **createdDateTime**:

Definition from IEC62325/MarketOperations/ParticipantInterfaces/createdDateTime:

Date and time that this document was created.

Proposed definition in ESMP:

The confirmed date when this charge becomes or became valid.

ChargeType attribute **lastModifiedDateTime**:

Definition from IEC62325/MarketOperations/ParticipantInterfaces/lastModifiedDateTime:

Date and time this document was last modified. Documents may potentially be modified many times during their lifetime.

Proposed definition in ESMP:

The date and/or time for when this charge was last changed.

ChargeType attribute **revisionNumber**:

Definition from IEC62325/MarketOperations/ParticipantInterfaces/revisionNumber:

Utility-specific classification of this document, according to its corporate standards, practices, and existing IT systems (e.g., for management of assets, maintenance, work, outage, customers, etc.).

Proposed definition in ESMP:

The type of charge, such as fee, tariff, or subscription.

ChargeType attribute **status**:

Definition from IEC62325/MarketOperations/ParticipantInterfaces/status:

Status of subject matter (e.g., Agreement, Work) this document represents. For status of the document itself, use 'docStatus' attribute.

Proposed definition in ESMP:

Status of the charge.

ChargeType attribute **description**:

Definition from IEC62325/MarketOperations/ParticipantInterfaces/description:

The description is a free human readable text describing or naming the object. It may be non unique and may not correlate to a naming hierarchy.

Proposed definition in ESMP:

A textual description of this charge.

ChargeType attribute **mRID**:

Definition from IEC62325/MarketOperations/ParticipantInterfaces/mRID:

Master resource identifier issued by a model authority. The mRID is unique within an exchange context. Global uniqueness is easily achieved by using a UUID, as specified in RFC 4122, for the mRID. The use of UUID is strongly recommended.

For CIMXML data files in RDF syntax conforming to IEC 61970-552, the mRID is mapped to rdf:ID or rdf:about attributes that identify CIM object elements.

Proposed definition in ESMP:

The unique identification of the charge.

ChargeType attribute **name**:

Definition from IEC62325/MarketOperations/ParticipantInterfaces/name:

The name is any free human readable and possibly non unique text naming the object.

Proposed definition in ESMP:

The name of this charge.

5   Final agreement

Retail SG agrees to send this MR for ESMP and WG16 review