



European Network of
Transmission System Operators
for Electricity

WEATHER CONFIGURATION DOCUMENT UML MODEL AND SCHEMA

2021-06-01
APPROVED DOCUMENT
VERSION 1.0

2

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57

Revision History

Version	Release	Date	Comments
1	0	2021-06-01	First draft of the document. Changes in weather configuration document xsd v1.1: <ul style="list-style-type: none">mRIDs were extended to 60 characters. Approved by MC.

58

59 1 Objective

60 The purpose of this document is to provide the contextual and assembly UML models and the
61 schema of the WeatherConfiguration_MarketDocument.

62 The schema of the WeatherConfiguration_MarketDocument could be used in various business
63 processes.

64 It is not the purpose of this document to describe all the use cases, sequence diagrams,
65 business processes, etc. for which this schema is to be used.

66 This document shall only be referenced in an implementation guide of a specific business
67 process. The content of the business process implementation guide shall be as follows:

- 68 • Description of the business process;
- 69 • Use case of the business process;
- 70 • Sequence diagrams of the business process;
- 71 • List of the schema (XSD) to be used in the business process and versions of the
72 schema;
- 73 • For each schema, dependency tables providing the necessary information for the
74 generation of the XML instances, i.e. when the optional attributes are to be used, which
75 codes from which ENTSO-E codelist are to be used.

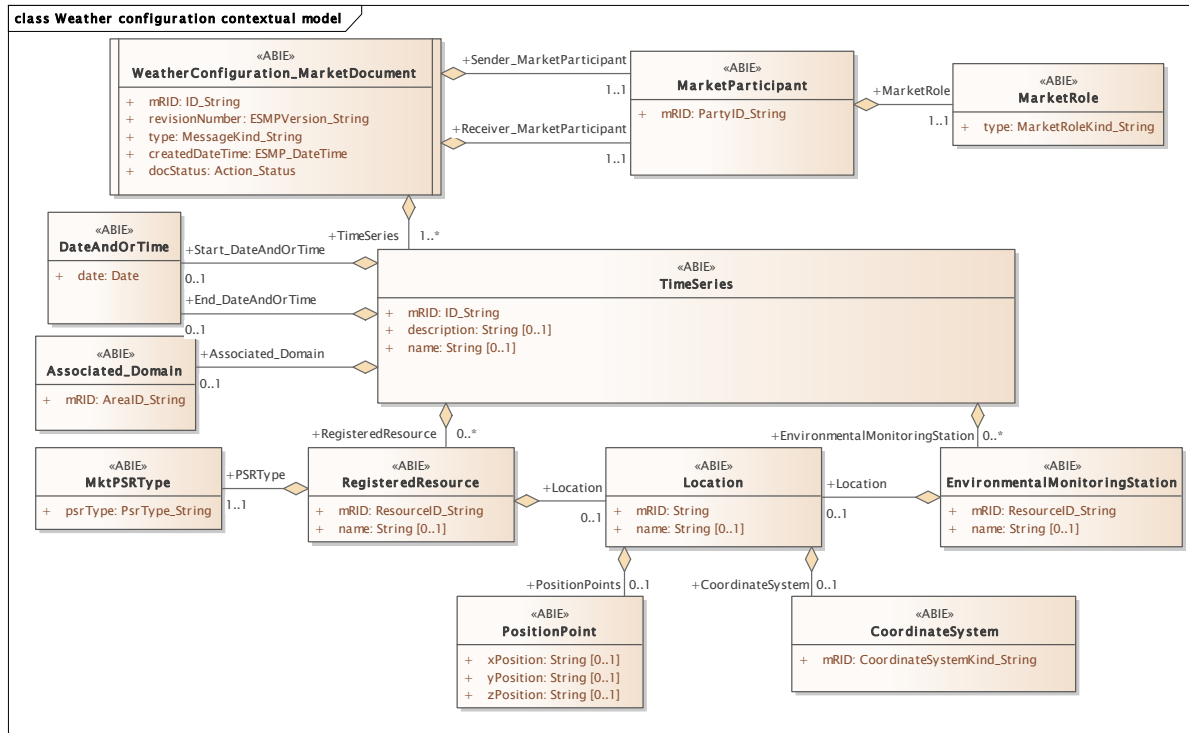
76

77 **2 WeatherConfiguration_MarketDocument**

78 **2.1 Weather configuration contextual model**

79 **2.1.1 Overview of the model**

80 Figure 1 shows the model.



81

82

Figure 1 - Weather configuration contextual model

83

84

85 **2.1.2 IsBasedOn relationships from the European style market profile**

86 Table 1 shows the traceability dependency of the classes used in this package towards the
87 upper level.

88

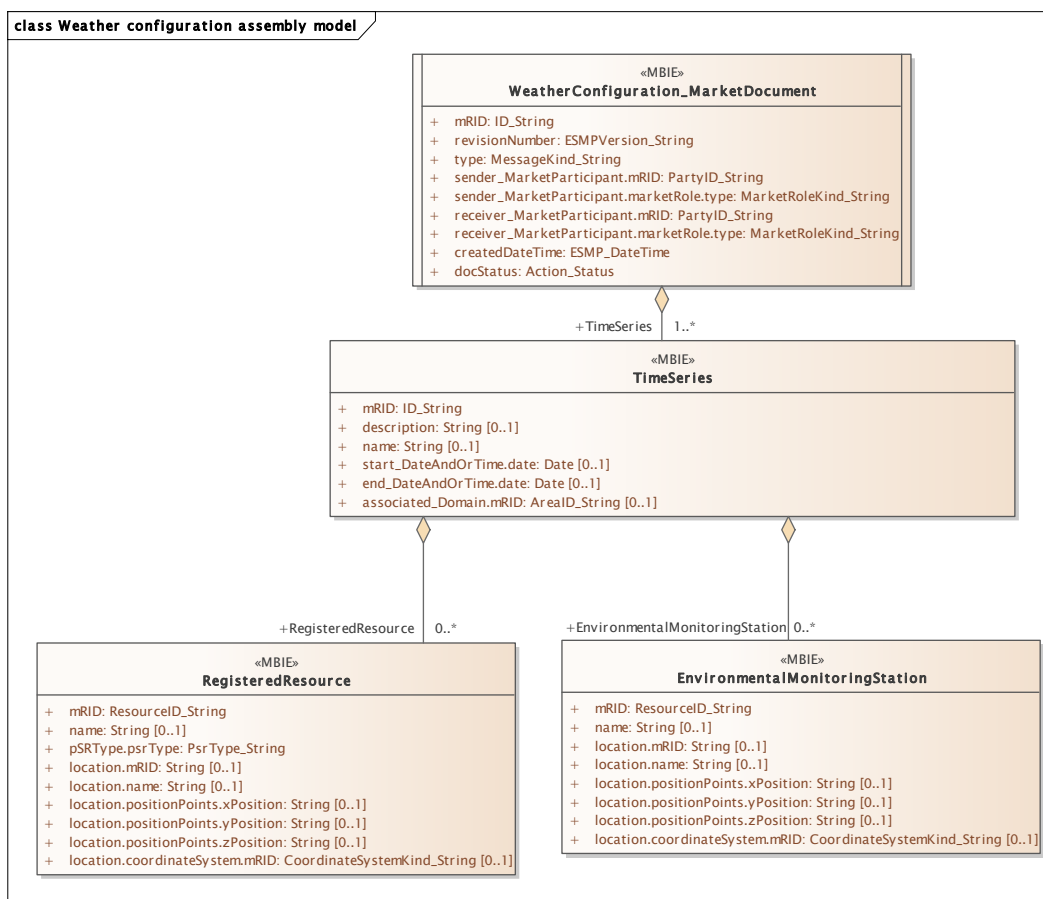
Table 1 - IsBasedOn dependency

Name	Complete IsBasedOn Path
Associated_Domain	TC57CIM::IEC62325::MarketManagement::Domain
CoordinateSystem	TC57CIM::IEC61968::Common::CoordinateSystem
DateAndOrTime	TC57CIM::IEC62325::MarketManagement::DateAndOrTime
EnvironmentalMonitoringStation	TC57CIM::IEC62325::MarketCommon::EnvironmentalMonitoringStation
Location	TC57CIM::IEC61968::Common::Location
MarketParticipant	TC57CIM::IEC62325::MarketCommon::MarketParticipant
MarketRole	TC57CIM::IEC62325::MarketCommon::MarketRole
MktPSRType	TC57CIM::IEC62325::MarketManagement::MktPSRType
PositionPoint	TC57CIM::IEC61968::Common::PositionPoint
RegisteredResource	TC57CIM::IEC62325::MarketCommon::RegisteredResource
TimeSeries	TC57CIM::IEC62325::MarketManagement::TimeSeries
WeatherConfiguration_MarketDocument	TC57CIM::IEC62325::MarketManagement::MarketDocument

89

90

91
92 **2.2 Weather configuration assembly model**
93 **2.2.1 Overview of the model**
94 Figure 2 shows the model.



95
96 **Figure 2 - Weather configuration assembly model**

97 **2.2.2 IsBasedOn relationships from the European style market profile**

98 Table 2 shows the traceability dependency of the classes used in this package towards the
99 upper level.

100 **Table 2 - IsBasedOn dependency**

Name	Complete IsBasedOn Path
EnvironmentalMonitoringStation	TC57CIM::IEC62325::MarketCommon::EnvironmentalMonitoringStation
RegisteredResource	TC57CIM::IEC62325::MarketCommon::RegisteredResource
TimeSeries	TC57CIM::IEC62325::MarketManagement::TimeSeries
WeatherConfiguration_MarketDocument	TC57CIM::IEC62325::MarketManagement::MarketDocument

101

102 **2.2.3 Detailed Weather configuration assembly model**

103 **2.2.3.1 WeatherConfiguration_MarketDocument root class**

104 An electronic document containing the information necessary to satisfy the requirements of
105 weather configuration information.

106 Table 3 shows all attributes of WeatherConfiguration_MarketDocument.

107 **Table 3 - Attributes of Weather configuration assembly**
108 **model::WeatherConfiguration_MarketDocument**

Order	mult.	Attribute name / Attribute type	Description
0	[1..1]	mRID ID_String	The unique identification of the document being exchanged within a business process flow.
1	[1..1]	revisionNumber ESMPVersion_String	The identification of the version that distinguishes one evolution of a document from another.
2	[1..1]	type MessageKind_String	The coded type of a document. The document type describes the principal characteristic of the document.
3	[1..1]	sender_MarketParticipant.mRID PartyID_String	The identification of a party in the energy market. --- The identification of the party that is the originator of the weather configuration. The originator of the document is identified by a unique coded identification. The MarketParticipant that transmits the electronic document.
4	[1..1]	sender_MarketParticipant.marketRole.type MarketRoleKind_String	The identification of the role played by a market player. --- The identification of the party that is the originator of the weather configuration. The originator of the document is identified by a unique coded identification. The MarketParticipant that transmits the electronic document. --- The role associated with a MarketParticipant.
5	[1..1]	receiver_MarketParticipant.mRID PartyID_String	The identification of a party in the energy market. --- The document recipient.
6	[1..1]	receiver_MarketParticipant.marketRole.type MarketRoleKind_String	The identification of the role played by a market player. --- The document recipient --- The role associated with a MarketParticipant.
7	[1..1]	createdDateTime ESMP_DateTime	The date and time of the creation of the document.
8	[1..1]	docStatus Action_Status	The identification of the condition or position of the document with regard to its standing.

109

110 Table 4 shows all association ends of WeatherConfiguration_MarketDocument with other
111 classes.

112
113

**Table 4 - Association ends of Weather configuration assembly
model::WeatherConfiguration_MarketDocument with other classes**

Order	mult.	Class name / Role	Description
9	[1..*]	TimeSeries TimeSeries	The time series that is associated with an electronic document. Association Based On: Weather configuration contextual model::WeatherConfiguration_MarketDocument.[] ----- Weather configuration contextual model::TimeSeries.TimeSeries[1..*]

114

115 2.2.3.2 EnvironmentalMonitoringStation

116 An environmental monitoring station, examples of which could be a weather station or a seismic
117 monitoring station.

118 Table 5 shows all attributes of EnvironmentalMonitoringStation.

119 **Table 5 - Attributes of Weather configuration assembly**
120 **model::EnvironmentalMonitoringStation**

Order	mult.	Attribute name / Attribute type	Description
0	[1..1]	mRID ResourceID_String	The unique identification of an environmental monitoring station.
1	[0..1]	name String	The name is any free human readable and possibly non unique text naming the object.
2	[0..1]	location.mRID String	The unique identification of a location. --- Location of this monitoring station.
3	[0..1]	location.name String	The name is any free human readable and possibly non unique text naming the object. --- Location of this monitoring station.
4	[0..1]	location.positionPoints.xPosition String	X axis position. --- Location of this monitoring station. --- Sequence of position points describing this location, expressed in coordinate system 'Location.CoordinateSystem'.
5	[0..1]	location.positionPoints.yPosition String	Y axis position. --- Location of this monitoring station. --- Sequence of position points describing this location, expressed in coordinate system 'Location.CoordinateSystem'.
6	[0..1]	location.positionPoints.zPosition String	(if applicable) Z axis position. --- Location of this monitoring station. --- Sequence of position points describing this location, expressed in coordinate system 'Location.CoordinateSystem'.
7	[0..1]	location.coordinateSystem.mRID CoordinateSystemKind_String	The identification of a type of coordinate system. --- Location of this monitoring station. --- Coordinate system used to describe position points of this location.

121

122 2.2.3.3 RegisteredResource

123 A resource that is registered through the market participant registration system. Examples
124 include generating unit, load, and non-physical generator or load.

125 Table 6 shows all attributes of RegisteredResource.

126 **Table 6 - Attributes of Weather configuration assembly model::RegisteredResource**

Order	mult.	Attribute name / Attribute type	Description
0	[1..1]	mRID ResourceID_String	The unique identification of a resource. This could be for example a wind farm, an individual windmill from a farm, a group of photovoltaic panels, large consumers, etc.
1	[0..1]	name String	The name is any free human readable and possibly non unique text naming the object.
2	[1..1]	psrType.psrType PsrType_String	The coded type of a power system resource. --- Custom classification for this power system resource.
3	[0..1]	location.mRID String	The unique identification of a location. --- Location of this power system resource.
4	[0..1]	location.name String	The name is any free human readable and possibly non unique text naming the object. --- Location of this power system resource.
5	[0..1]	location.positionPoints.xPosition String	X axis position. --- Location of this power system resource. --- Sequence of position points describing this location, expressed in coordinate system 'Location.CoordinateSystem'.
6	[0..1]	location.positionPoints.yPosition String	Y axis position. --- Location of this power system resource. --- Sequence of position points describing this location, expressed in coordinate system 'Location.CoordinateSystem'.
7	[0..1]	location.positionPoints.zPosition String	(if applicable) Z axis position. --- Location of this power system resource. --- Sequence of position points describing this location, expressed in coordinate system 'Location.CoordinateSystem'.
8	[0..1]	location.coordinateSystem.mRID CoordinateSystemKind_String	The identification of a type of coordinate system. --- Location of this power system resource. --- Coordinate system used to describe position points of this location.

127

128 2.2.3.4 TimeSeries

129 A set of time-ordered quantities being exchanged in relation to a product.

130 In the ESMP profile, the TimeSeries provides not only time-ordered quantities but also time-ordered information.

132 Table 7 shows all attributes of TimeSeries.

133 **Table 7 - Attributes of Weather configuration assembly model::TimeSeries**

Order	mult.	Attribute name / Attribute type	Description
0	[1..1]	mRID ID_String	A unique identification of the time series.
1	[0..1]	description String	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.

Order	mult.	Attribute name / Attribute type	Description
2	[0..1]	name String	The name is any free human readable and possibly non unique text naming the object.
3	[0..1]	start_DateAndOrTime.date Date	The date as "YYYY-MM-DD", which conforms with ISO 8601. --- A date and/or time associated with a TimeSeries.
4	[0..1]	end_DateAndOrTime.date Date	The date as "YYYY-MM-DD", which conforms with ISO 8601. --- A date and/or time associated with a TimeSeries.
5	[0..1]	associated_Domain.mRID AreaID_String	The unique identification of the domain. --- The domain associated with a TimeSeries.

134

135 Table 8 shows all association ends of TimeSeries with other classes.

136 **Table 8 - Association ends of Weather configuration assembly model::TimeSeries with**
137 **other classes**

Order	mult.	Class name / Role	Description
6	[0..*]	RegisteredResource RegisteredResource	The identification of a registered resource. Association Based On: Weather configuration contextual model::TimeSeries.[] ----- Weather configuration contextual model::RegisteredResource.RegisteredResource[0..*]
7	[0..*]	EnvironmentalMonitoringStation EnvironmentalMonitoringStation	Association Based On: Weather configuration contextual model::EnvironmentalMonitoringStation.EnvironmentalMonitoringStation[0..*] ----- Weather configuration contextual model::TimeSeries.[]

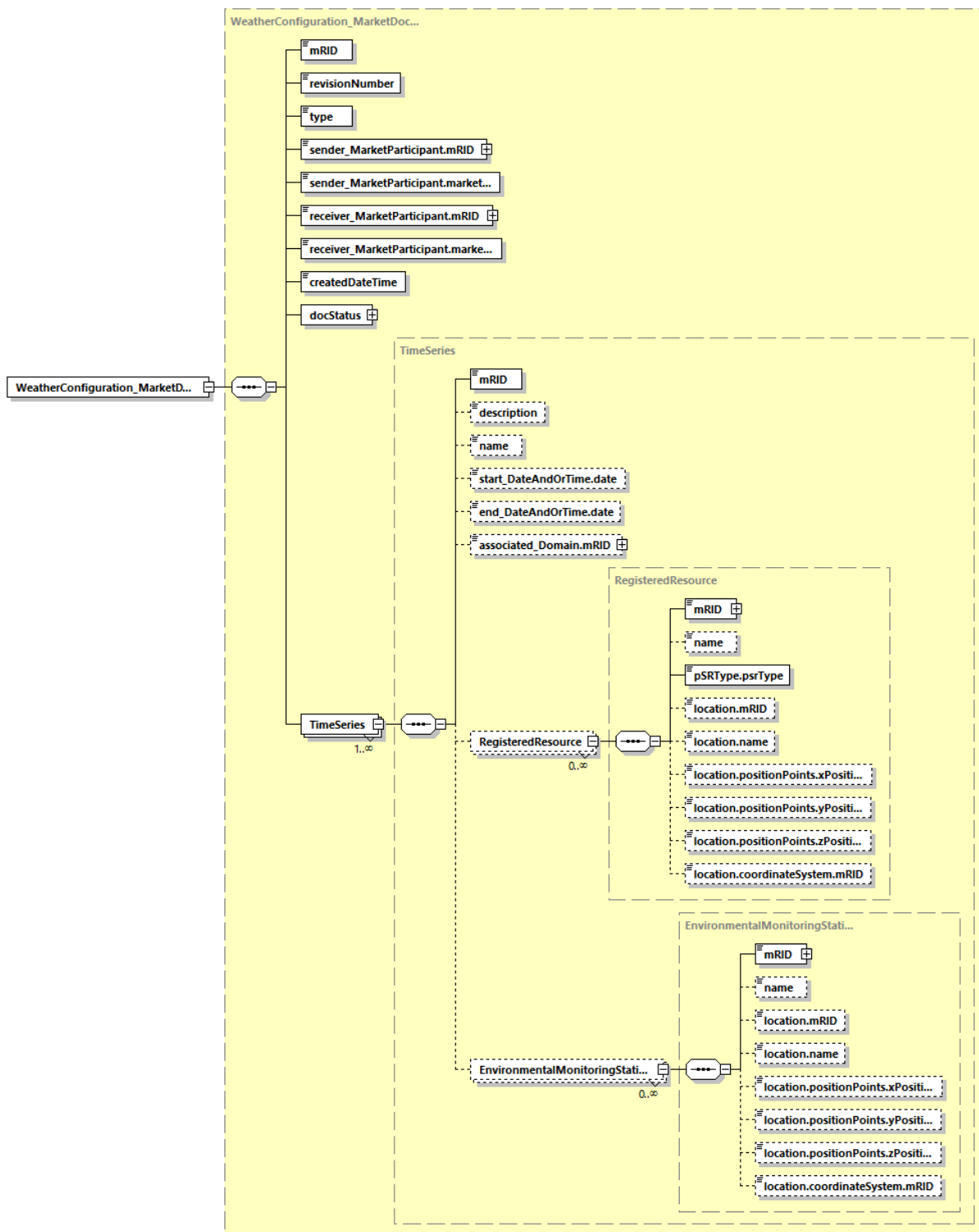
138

139 2.2.4 Datatypes

140 The list of datatypes used for the Weather configuration assembly model is as follows:

- 141 • Action_Status compound
- 142 • AreaID_String datatype, codelist CodingSchemeTypeList
- 143 • CoordinateSystemKind_String datatype, codelist CoordinateSystemTypeList
- 144 • ESMP_DateTime datatype
- 145 • ESMPVersion_String datatype
- 146 • ID_String datatype
- 147 • MarketRoleKind_String datatype, codelist RoleTypeList
- 148 • MessageKind_String datatype, codelist MessageTypeList
- 149 • PartyID_String datatype, codelist CodingSchemeTypeList
- 150 • PsrType_String datatype, codelist AssetTypeList
- 151 • ResourceID_String datatype, codelist CodingSchemeTypeList
- 152 • Status_String datatype, codelist StatusTypeList

153 2.2.5 WeatherConfiguration_MarketDocument XML schema structure



Generated by XMLSpy www.altova.com

Figure 3 - WeatherConfiguration_MarketDocument schema structure

154
155

156 2.2.6 WeatherConfiguration_MarketDocument XML schema

157

158 The schema to be used to validate XML instances is to be identified by:

159 urn:iec62325.351:tc57wg16:451-n:weatherconfigurationdocument:1:1

160

```
161 <?xml version="1.0" encoding="utf-8"?>
162 <xs:schema xmlns:ecl="urn:entsoe.eu:wgedi:codelists"
163 xmlns="urn:iec62325.351:tc57wg16:451-n:weatherconfigurationdocument:1:1"
164 xmlns:sawsdl="http://www.w3.org/ns/sawsdl"
165 xmlns:cimp="http://www.iec.ch/cimprofile"
166 xmlns:xs="http://www.w3.org/2001/XMLSchema"
167 targetNamespace="urn:iec62325.351:tc57wg16:451-n:weatherconfigurationdocument:1:1"
168 elementFormDefault="qualified" attributeFormDefault="unqualified">
169   <xs:import namespace="urn:entsoe.eu:wgedi:codelists" schemaLocation="urn-
170 entsoe-eu-wgedi-codelists.xsd"/>
171   <xs:element name="WeatherConfiguration_MarketDocument"
172 type="WeatherConfiguration_MarketDocument"/>
173   <xs:simpleType name="ResourceID_String-base"
174 sawsdl:modelReference="http://iec.ch/TC57/2013/CIM-schema-cim16#String">
175     <xs:restriction base="xs:string">
176       <xs:maxLength value="60"/>
177     </xs:restriction>
178   </xs:simpleType>
179   <xs:complexType name="ResourceID_String"
180 sawsdl:modelReference="http://iec.ch/TC57/2013/CIM-schema-cim16#String">
181     <xs:simpleContent>
182       <xs:extension base="ResourceID_String-base">
183         <xs:attribute name="codingScheme"
184 type="ecl:CodingSchemeTypeList" use="required"/>
185       </xs:extension>
186     </xs:simpleContent>
187   </xs:complexType>
188   <xs:simpleType name="CoordinateSystemKind_String"
189 sawsdl:modelReference="http://iec.ch/TC57/2013/CIM-schema-cim16#String">
190     <xs:restriction base="ecl:CoordinateSystemTypeList"/>
191   </xs:simpleType>
192   <xs:complexType name="EnvironmentalMonitoringStation"
193 sawsdl:modelReference="http://iec.ch/TC57/2013/CIM-schema-
194 cim16#EnvironmentalMonitoringStation">
195     <xs:sequence>
196       <xs:element name="mRID" type="ResourceID_String" minOccurs="1"
197 maxOccurs="1" sawsdl:modelReference="http://iec.ch/TC57/2013/CIM-schema-
198 cim16#IdentifiedObject.mRID"/>
199       <xs:element name="name" type="xs:string" minOccurs="0"
200 maxOccurs="1" sawsdl:modelReference="http://iec.ch/TC57/2013/CIM-schema-
201 cim16#IdentifiedObject.name"/>
202       <xs:element name="location.mRID" type="xs:string" minOccurs="0"
203 maxOccurs="1" sawsdl:modelReference="http://iec.ch/TC57/2013/CIM-schema-
204 cim16#IdentifiedObject.mRID"/>
205       <xs:element name="location.name" type="xs:string" minOccurs="0"
206 maxOccurs="1" sawsdl:modelReference="http://iec.ch/TC57/2013/CIM-schema-
207 cim16#IdentifiedObject.name"/>
```

```

208         <xs:element name="location.positionPoints.xPosition"
209 type="xs:string" minOccurs="0" maxOccurs="1"
210 sawsdl:modelReference="http://iec.ch/TC57/2013/CIM-schema-
211 cim16#PositionPoint.xPosition"/>
212         <xs:element name="location.positionPoints.yPosition"
213 type="xs:string" minOccurs="0" maxOccurs="1"
214 sawsdl:modelReference="http://iec.ch/TC57/2013/CIM-schema-
215 cim16#PositionPoint.yPosition"/>
216         <xs:element name="location.positionPoints.zPosition"
217 type="xs:string" minOccurs="0" maxOccurs="1"
218 sawsdl:modelReference="http://iec.ch/TC57/2013/CIM-schema-
219 cim16#PositionPoint.zPosition"/>
220         <xs:element name="location.coordinateSystem.mRID"
221 type="CoordinateSystemKind_String" minOccurs="0" maxOccurs="1"
222 sawsdl:modelReference="http://iec.ch/TC57/2013/CIM-schema-
223 cim16#IdentifiedObject.mRID"/>
224     </xs:sequence>
225 </xs:complexType>
226 <xs:simpleType name="PsrType_String"
227 sawsdl:modelReference="http://iec.ch/TC57/2013/CIM-schema-cim16#String">
228     <xs:restriction base="ecl:AssetTypeList"/>
229 </xs:simpleType>
230 <xs:complexType name="RegisteredResource"
231 sawsdl:modelReference="http://iec.ch/TC57/2013/CIM-schema-
232 cim16#RegisteredResource">
233     <xs:sequence>
234         <xs:element name="mRID" type="ResourceID_String" minOccurs="1"
235 maxOccurs="1" sawsdl:modelReference="http://iec.ch/TC57/2013/CIM-schema-
236 cim16#IdentifiedObject.mRID"/>
237         <xs:element name="name" type="xs:string" minOccurs="0"
238 maxOccurs="1" sawsdl:modelReference="http://iec.ch/TC57/2013/CIM-schema-
239 cim16#IdentifiedObject.name"/>
240         <xs:element name="pSRType.psrType" type="PsrType_String"
241 minOccurs="1" maxOccurs="1" sawsdl:modelReference="http://iec.ch/TC57/2013/CIM-
242 schema-cim16#MktPSRType.psrType"/>
243         <xs:element name="location.mRID" type="xs:string" minOccurs="0"
244 maxOccurs="1" sawsdl:modelReference="http://iec.ch/TC57/2013/CIM-schema-
245 cim16#IdentifiedObject.mRID"/>
246         <xs:element name="location.name" type="xs:string" minOccurs="0"
247 maxOccurs="1" sawsdl:modelReference="http://iec.ch/TC57/2013/CIM-schema-
248 cim16#IdentifiedObject.name"/>
249         <xs:element name="location.positionPoints.xPosition"
250 type="xs:string" minOccurs="0" maxOccurs="1"
251 sawsdl:modelReference="http://iec.ch/TC57/2013/CIM-schema-
252 cim16#PositionPoint.xPosition"/>
253         <xs:element name="location.positionPoints.yPosition"
254 type="xs:string" minOccurs="0" maxOccurs="1"
255 sawsdl:modelReference="http://iec.ch/TC57/2013/CIM-schema-
256 cim16#PositionPoint.yPosition"/>
257         <xs:element name="location.positionPoints.zPosition"
258 type="xs:string" minOccurs="0" maxOccurs="1"
259 sawsdl:modelReference="http://iec.ch/TC57/2013/CIM-schema-
260 cim16#PositionPoint.zPosition"/>
261         <xs:element name="location.coordinateSystem.mRID"
262 type="CoordinateSystemKind_String" minOccurs="0" maxOccurs="1"

```

```
263 sawsdl:modelReference="http://iec.ch/TC57/2013/CIM-schema-
264 cim16#IdentifiedObject.mRID"/>
265     </xs:sequence>
266   </xs:complexType>
267   <xs:simpleType name="ID_String"
268 sawsdl:modelReference="http://iec.ch/TC57/2013/CIM-schema-cim16#String">
269     <xs:restriction base="xs:string">
270       <xs:maxLength value="60"/>
271     </xs:restriction>
272   </xs:simpleType>
273   <xs:simpleType name="AreaID_String-base"
274 sawsdl:modelReference="http://iec.ch/TC57/2013/CIM-schema-cim16#String">
275     <xs:restriction base="xs:string">
276       <xs:maxLength value="18"/>
277     </xs:restriction>
278   </xs:simpleType>
279   <xs:complexType name="AreaID_String"
280 sawsdl:modelReference="http://iec.ch/TC57/2013/CIM-schema-cim16#String">
281     <xs:simpleContent>
282       <xs:extension base="AreaID_String-base">
283         <xs:attribute name="codingScheme"
284 type="ecl:CodingSchemeTypeList" use="required"/>
285       </xs:extension>
286     </xs:simpleContent>
287   </xs:complexType>
288   <xs:complexType name="TimeSeries"
289 sawsdl:modelReference="http://iec.ch/TC57/2013/CIM-schema-cim16#TimeSeries">
290     <xs:sequence>
291       <xs:element name="mRID" type="ID_String" minOccurs="1"
292 maxOccurs="1" sawsdl:modelReference="http://iec.ch/TC57/2013/CIM-schema-
293 cim16#IdentifiedObject.mRID"/>
294       <xs:element name="description" type="xs:string" minOccurs="0"
295 maxOccurs="1" sawsdl:modelReference="http://iec.ch/TC57/2013/CIM-schema-
296 cim16#IdentifiedObject.description"/>
297       <xs:element name="name" type="xs:string" minOccurs="0"
298 maxOccurs="1" sawsdl:modelReference="http://iec.ch/TC57/2013/CIM-schema-
299 cim16#IdentifiedObject.name"/>
300       <xs:element name="start_DateAndOrTime.date" type="xs:date"
301 minOccurs="0" maxOccurs="1" sawsdl:modelReference="http://iec.ch/TC57/2013/CIM-
302 schema-cim16#DateAndOrTime.date"/>
303       <xs:element name="end_DateAndOrTime.date" type="xs:date"
304 minOccurs="0" maxOccurs="1" sawsdl:modelReference="http://iec.ch/TC57/2013/CIM-
305 schema-cim16#DateAndOrTime.date"/>
306       <xs:element name="associated_Domain.mRID" type="AreaID_String"
307 minOccurs="0" maxOccurs="1" sawsdl:modelReference="http://iec.ch/TC57/2013/CIM-
308 schema-cim16#IdentifiedObject.mRID"/>
309       <xs:element name="RegisteredResource" type="RegisteredResource"
310 minOccurs="0" maxOccurs="unbounded"
311 sawsdl:modelReference="http://iec.ch/TC57/2013/CIM-schema-
312 cim16#TimeSeries.RegisteredResource"/>
313       <xs:element name="EnvironmentalMonitoringStation"
314 type="EnvironmentalMonitoringStation" minOccurs="0" maxOccurs="unbounded"
315 sawsdl:modelReference="http://iec.ch/TC57/2013/CIM-schema-
316 cim16#TimeSeries.EnvironmentalMonitoringStation"/>
317     </xs:sequence>
318   </xs:complexType>
```



```

319     <xs:simpleType name="ESMPVersion_String"
320 sawsdl:modelReference="http://iec.ch/TC57/2013/CIM-schema-cim16#String">
321     <xs:restriction base="xs:string">
322         <xs:pattern value="[1-9]([0-9]){0,2}"/>
323     </xs:restriction>
324 </xs:simpleType>
325 <xs:simpleType name="MessageKind_String"
326 sawsdl:modelReference="http://iec.ch/TC57/2013/CIM-schema-cim16#String">
327 <xs:restriction base="ecl:MessageTypeList"/>
328 </xs:simpleType>
329 <xs:simpleType name="PartyID_String-base"
330 sawsdl:modelReference="http://iec.ch/TC57/2013/CIM-schema-cim16#String">
331 <xs:restriction base="xs:string">
332 <xs:maxLength value="16"/>
333 </xs:restriction>
334 </xs:simpleType>
335 <xs:complexType name="PartyID_String"
336 sawsdl:modelReference="http://iec.ch/TC57/2013/CIM-schema-cim16#String">
337 <xs:simpleContent>
338 <xs:extension base="PartyID_String-base">
339 <xs:attribute name="codingScheme"
340 type="ecl:CodingSchemeTypeList" use="required"/>
341 </xs:extension>
342 </xs:simpleContent>
343 </xs:complexType>
344 <xs:simpleType name="MarketRoleKind_String"
345 sawsdl:modelReference="http://iec.ch/TC57/2013/CIM-schema-cim16#String">
346 <xs:restriction base="ecl:RoleTypeList"/>
347 </xs:simpleType>
348 <xs:simpleType name="ESMP_DateTime"
349 sawsdl:modelReference="http://iec.ch/TC57/2013/CIM-schema-cim16#DateTime">
350 <xs:restriction base="xs:dateTime">
351 <xs:pattern value="((([0-9]{4})[\-](0[13578]|1[02])[\-](0[1-
352 9]|[12][0-9]|3[01])|([0-9]{4})[\-]((0[469])|(11))[\-](0[1-9]|12)[0-
353 9]|30))T(([01][0-9]|2[0-3]):[0-5][0-9]:[0-5][0-
354 9])Z|(((13579)[26][02468][048]|13579[01345789](0)[48]|13579[01345789][2468][0
355 48]|02468[048][02468][048]|02468[1235679](0)[48]|02468[1235679][2468][048]|[
356 0-9][0-9][13579][26])[\-](02)[\-](0[1-9]|1[0-9]|2[0-9])T(([01][0-9]|2[0-3]):[0-
357 5][0-9]:[0-5][0-
358 9])Z|(((13579)[26][02468][1235679]|13579[01345789](0)[01235679]|13579[0134578
359 9][2468][1235679]|02468[048][02468][1235679]|02468[1235679](0)[01235679]|0246
360 8][1235679][2468][1235679]|0-9[0-9][13579][01345789])[\-](02)[\-](0[1-9]|1[0-
361 9]|2[0-8])T(([01][0-9]|2[0-3]):[0-5][0-9]:[0-5][0-9])Z"/>
362 </xs:restriction>
363 </xs:simpleType>
364 <xs:simpleType name="Status_String"
365 sawsdl:modelReference="http://iec.ch/TC57/2013/CIM-schema-cim16#String">
366 <xs:restriction base="ecl:StatusTypeList"/>
367 </xs:simpleType>
368 <xs:complexType name="Action_Status"
369 sawsdl:modelReference="http://iec.ch/TC57/2013/CIM-schema-cim16#Status">
370 <xs:sequence>
371 <xs:element name="value" type="Status_String" minOccurs="1"
372 maxOccurs="1" sawsdl:modelReference="http://iec.ch/TC57/2013/CIM-schema-
373 cim16#Status.value"/>
374 </xs:sequence>

```

```
375         </xs:complexType>
376         <xs:complexType name="WeatherConfiguration_MarketDocument"
377 sawsdl:modelReference="http://iec.ch/TC57/2013/CIM-schema-cim16#MarketDocument">
378             <xs:sequence>
379                 <xs:element name="mRID" type="ID_String" minOccurs="1"
380 maxOccurs="1" sawsdl:modelReference="http://iec.ch/TC57/2013/CIM-schema-
381 cim16#IdentifiedObject.mRID"/>
382                 <xs:element name="revisionNumber" type="ESMPVersion_String"
383 minOccurs="1" maxOccurs="1" sawsdl:modelReference="http://iec.ch/TC57/2013/CIM-
384 schema-cim16#Document.revisionNumber"/>
385                 <xs:element name="type" type="MessageKind_String" minOccurs="1"
386 maxOccurs="1" sawsdl:modelReference="http://iec.ch/TC57/2013/CIM-schema-
387 cim16#Document.type"/>
388                 <xs:element name="sender_MarketParticipant.mRID"
389 type="PartyID_String" minOccurs="1" maxOccurs="1"
390 sawsdl:modelReference="http://iec.ch/TC57/2013/CIM-schema-
391 cim16#IdentifiedObject.mRID"/>
392                 <xs:element name="sender_MarketParticipant.marketRole.type"
393 type="MarketRoleKind_String" minOccurs="1" maxOccurs="1"
394 sawsdl:modelReference="http://iec.ch/TC57/2013/CIM-schema-cim16#MarketRole.type"/>
395                 <xs:element name="receiver_MarketParticipant.mRID"
396 type="PartyID_String" minOccurs="1" maxOccurs="1"
397 sawsdl:modelReference="http://iec.ch/TC57/2013/CIM-schema-
398 cim16#IdentifiedObject.mRID"/>
399                 <xs:element name="receiver_MarketParticipant.marketRole.type"
400 type="MarketRoleKind_String" minOccurs="1" maxOccurs="1"
401 sawsdl:modelReference="http://iec.ch/TC57/2013/CIM-schema-cim16#MarketRole.type"/>
402                 <xs:element name="createdDateTime" type="ESMP_DateTime"
403 minOccurs="1" maxOccurs="1" sawsdl:modelReference="http://iec.ch/TC57/2013/CIM-
404 schema-cim16#Document.createdDateTime"/>
405                 <xs:element name="docStatus" type="Action_Status" minOccurs="1"
406 maxOccurs="1" sawsdl:modelReference="http://iec.ch/TC57/2013/CIM-schema-
407 cim16#Document.docStatus"/>
408                 <xs:element name="TimeSeries" type="TimeSeries" minOccurs="1"
409 maxOccurs="unbounded" sawsdl:modelReference="http://iec.ch/TC57/2013/CIM-schema-
410 cim16#MarketDocument.TimeSeries"/>
411             </xs:sequence>
412         </xs:complexType>
413 </xs:schema>
414
```