```xml
1  <?xml version="1.0" encoding="ISO-8859-1"?>
2  <xs:schema xmlns:pyld="http://docs.oasis-open.org/ns/energyinterop/201110/payloads" xmlns:enrl="
   http://docs.oasis-open.org/ns/energyinterop/201110/enroll" xmlns:xs="http://www.w3.org/2001/XMLSchema" xmlns:power="
   http://docs.oasis-open.org/ns/emix/2011/06/power" xmlns:xcal="urn:ietf:params:xml:ns:icalendar-2.0" xmlns:emix="
   http://docs.oasis-open.org/ns/emix/2011/06" xmlns:ei="http://docs.oasis-open.org/ns/energyinterop/201110" targetNamespace="
   http://docs.oasis-open.org/ns/energyinterop/201110/payloads">
3    <xs:import namespace="urn:ietf:params:xml:ns:icalendar-2.0" schemaLocation="
   http://docs.oasis-open.org/ws-calendar/ws-calendar-spec/v1.0/cs01/xsd/iCalendar.xsd"/>
4    <xs:import namespace="urn:ietf:params:xml:ns:icalendar-2.0" schemaLocation="
   http://docs.oasis-open.org/ws-calendar/ws-calendar-spec/v1.0/cs01/xsd/iCalendar-wscal-extensions.xsd"/>
5    <xs:import namespace="urn:ietf:params:xml:ns:icalendar-2.0" schemaLocation="
   http://docs.oasis-open.org/ws-calendar/ws-calendar-spec/v1.0/cs01/xsd/iCalendar-availability-extension.xsd"/>
6    <xs:import namespace="http://docs.oasis-open.org/ns/emix/2011/06" schemaLocation="
   http://docs.oasis-open.org/emix/emix/v1.0/csprd04/xsd/emix.xsd"/>
7    <xs:import namespace="http://docs.oasis-open.org/ns/energyinterop/201110" schemaLocation="EiClasses.xsd"/>
8    <xs:import namespace="http://docs.oasis-open.org/ns/energyinterop/201110/enroll" schemaLocation="EiEnrollment.xsd"/>
9    <!-- 1.0 Event Payloads -->
10   <xs:element name="eiCreateEvent" type="pyld:EiCreateEventType"/>
11   <xs:complexType name="EiCreateEventType">
12     <xs:annotation>
13       <xs:documentation>Used to Create and send a new event or modification.</xs:documentation>
14     </xs:annotation>
15     <xs:sequence>
16       <xs:element ref="pyld:requestID" minOccurs="1" maxOccurs="1"/>
17       <xs:element ref="ei:vtnID" minOccurs="1" maxOccurs="1"/>
18       <xs:element ref="ei:eiEvent" minOccurs="1" maxOccurs="unbounded"/>
19     </xs:sequence>
20   </xs:complexType>
21   <xs:element name="eiCreatedEvent" type="pyld:EiCreatedEventType"/>
22   <xs:complexType name="EiCreatedEventType">
23     <xs:annotation>
24       <xs:documentation>used to respond to CreateEvent.</xs:documentation>
25     </xs:annotation>
26     <xs:sequence>
27       <xs:element ref="ei:eiResponse" minOccurs="1" maxOccurs="1"/>
28       <xs:element ref="ei:eventResponses" minOccurs="0" maxOccurs="1"/>
29       <xs:element ref="ei:venID" minOccurs="1" maxOccurs="1"/>
30     </xs:sequence>
31   </xs:complexType>
32   <xs:element name="eiCancelEvent" type="pyld:EiCancelEventType"/>
33   <xs:complexType name="EiCancelEventType">
34     <xs:annotation>
35       <xs:documentation>Cancel one or more Events, sent from VTN to VEN.</xs:documentation>
36     </xs:annotation>
37     <xs:sequence>
38       <xs:element ref="pyld:requestID" minOccurs="1" maxOccurs="1"/>
39       <xs:element ref="ei:eventID" minOccurs="1" maxOccurs="unbounded"/>
40     </xs:sequence>
41   </xs:complexType>
42   <xs:element name="eiCanceledEvent" type="pyld:EiCanceledEventType"/>
43   <xs:complexType name="EiCanceledEventType">
44     <xs:sequence>
45       <xs:element ref="ei:eiResponse" minOccurs="1" maxOccurs="1"/>
46       <xs:element ref="ei:eventResponses" minOccurs="0" maxOccurs="1"/>
47     </xs:sequence>
48   </xs:complexType>
49   <xs:element name="eiChangeEvent" type="pyld:EiChangeEventType"/>
50   <xs:complexType name="EiChangeEventType">
51     <xs:annotation>
52       <xs:documentation>Used to modify an existing event.</xs:documentation>
53     </xs:annotation>
54     <xs:sequence>
```

```xml
55          <xs:element ref="pyld:requestID" minOccurs="1" maxOccurs="1"/>
56          <xs:element ref="ei:vtnID" minOccurs="1" maxOccurs="1"/>
57          <xs:element ref="ei:eiEvent" minOccurs="1" maxOccurs="unbounded"/>
58          <xs:element name="changeComment" type="xs:string" minOccurs="0" maxOccurs="1"/>
59        </xs:sequence>
60      </xs:complexType>
61      <xs:element name="eiChangedEvent" type="pyld:EiChangedEventType"/>
62      <xs:complexType name="EiChangedEventType">
63        <xs:sequence>
64          <xs:element ref="ei:eiResponse" minOccurs="1" maxOccurs="1"/>
65          <xs:element ref="ei:eventResponses" minOccurs="0" maxOccurs="1"/>
66          <xs:element ref="ei:venID" minOccurs="1" maxOccurs="1"/>
67        </xs:sequence>
68      </xs:complexType>
69      <xs:element name="eiRequestEvent" type="pyld:EiRequestEventType"/>
70      <xs:complexType name="EiRequestEventType">
71        <xs:annotation>
72          <xs:documentation>Used to request Events known to the counterparty. A VTN may ask a VEN or a VEN may ask a VTN.
    </xs:documentation>
73        </xs:annotation>
74        <xs:sequence>
75          <xs:element ref="pyld:requestID" minOccurs="1" maxOccurs="1"/>
76          <xs:element ref="ei:eventID" minOccurs="0" maxOccurs="unbounded"/>
77          <xs:element ref="emix:marketContext" minOccurs="0" maxOccurs="unbounded"/>
78          <xs:element ref="ei:venID" minOccurs="1" maxOccurs="1"/>
79          <xs:element ref="xcal:interval" minOccurs="0" maxOccurs="1">
80            <xs:annotation>
81              <xs:documentation>If present, limits range of request to events within the Interval. An event is within an Interval if
    any part of it occurs within the Interval, from the beginning of the Notification Period to the end of the Recovery Period.</
    xs:documentation>
82            </xs:annotation>
83          </xs:element>
84          <xs:element ref="pyld:eventFilter" minOccurs="0" maxOccurs="1"/>
85          <xs:element ref="pyld:replyLimit" minOccurs="0" maxOccurs="1"/>
86        </xs:sequence>
87      </xs:complexType>
88      <xs:element name="eiReplyEvent" type="pyld:EiReplyEventType"/>
89      <xs:complexType name="EiReplyEventType">
90        <xs:sequence>
91          <xs:element ref="ei:eiResponse" minOccurs="1" maxOccurs="1"/>
92          <xs:element ref="ei:venID" minOccurs="1" maxOccurs="1"/>
93          <xs:element ref="ei:vtnID" minOccurs="1" maxOccurs="1"/>
94          <xs:element ref="ei:eiEvent" minOccurs="0" maxOccurs="unbounded">
95            <xs:annotation>
96              <xs:documentation>Collection of Events that match the Request.</xs:documentation>
97            </xs:annotation>
98          </xs:element>
99        </xs:sequence>
100     </xs:complexType>
101     <xs:element name="eiRequestPendingEvent" type="pyld:EiRequestPendingEventType"/>
102     <xs:complexType name="EiRequestPendingEventType">
103       <xs:annotation>
104         <xs:documentation>Used to request pending Events. An event is pending if any part of it occurs "now", from the
    beginning of the Notification Period to the end of the Recovery Period.</xs:documentation>
105       </xs:annotation>
106       <xs:sequence>
107         <xs:element ref="pyld:requestID" minOccurs="1" maxOccurs="1"/>
108         <xs:element ref="ei:eventID" minOccurs="0" maxOccurs="unbounded"/>
109         <xs:element ref="emix:marketContext" minOccurs="0" maxOccurs="unbounded"/>
110         <xs:element ref="ei:venID" minOccurs="1" maxOccurs="1"/>
111         <xs:element ref="xcal:interval" minOccurs="0" maxOccurs="1">
112           <xs:annotation>
```

```xml
113        <xs:documentation>If absent, pending is defined as "this instant". If present, extends range of pending as defined in
    this payload.</xs:documentation>
114          </xs:annotation>
115        </xs:element>
116        <xs:element ref="pyld:eventFilter" minOccurs="0" maxOccurs="1"/>
117        <xs:element ref="pyld:replyLimit" minOccurs="0" maxOccurs="1"/>
118      </xs:sequence>
119    </xs:complexType>
120    <xs:element name="eiReplyPendingEvent" type="pyld:EiReplyPendingEventType"/>
121    <xs:complexType name="EiReplyPendingEventType">
122      <xs:sequence>
123        <xs:element ref="ei:eiResponse" minOccurs="1" maxOccurs="1"/>
124        <xs:element ref="ei:qualifiedEventID" minOccurs="0" maxOccurs="unbounded">
125          <xs:annotation>
126            <xs:documentation>Collection of IDs and Modification Numbers for Events that match the Request.</
    xs:documentation>
127          </xs:annotation>
128        </xs:element>
129      </xs:sequence>
130    </xs:complexType>
131    <xs:element name="eiDistributeEvent" type="pyld:EiDistributeEventType"/>
132    <xs:complexType name="EiDistributeEventType">
133      <xs:annotation>
134        <xs:documentation>For event distribution through broadcast, the VTN-VEN links, or otherwise (e.g. passive placing on
    a web site for REST-style access). This is a push, not a pull.</xs:documentation>
135      </xs:annotation>
136      <xs:sequence>
137        <xs:element ref="pyld:requestID" minOccurs="1" maxOccurs="1"/>
138        <xs:element ref="ei:vtnID" minOccurs="1" maxOccurs="1"/>
139        <xs:element ref="ei:eiTarget" minOccurs="0" maxOccurs="1"/>
140        <xs:element ref="ei:eiEvent" minOccurs="1" maxOccurs="unbounded"/>
141      </xs:sequence>
142    </xs:complexType>
143    <!-- 2.0 Availability Payloads -->
144    <xs:element name="eiCreateAvail" type="pyld:EiCreateAvailType"/>
145    <xs:complexType name="EiCreateAvailType">
146      <xs:annotation>
147        <xs:documentation>Create an Avail for this VEN; return the AvailID.</xs:documentation>
148      </xs:annotation>
149      <xs:sequence>
150        <xs:element ref="ei:eiAvail" minOccurs="1" maxOccurs="1"/>
151      </xs:sequence>
152    </xs:complexType>
153    <xs:element name="eiCreatedAvail" type="pyld:EiCreatedAvailType"/>
154    <xs:complexType name="EiCreatedAvailType">
155      <xs:sequence>
156        <xs:element ref="ei:availID" minOccurs="0" maxOccurs="1"/>
157        <xs:element ref="ei:eiResponse" minOccurs="1" maxOccurs="1"/>
158      </xs:sequence>
159    </xs:complexType>
160    <xs:element name="eiRequestAvail" type="pyld:EiRequestAvailType"/>
161    <xs:complexType name="EiRequestAvailType">
162      <xs:annotation>
163        <xs:documentation>Used to request Avail information for this VEN.</xs:documentation>
164      </xs:annotation>
165      <xs:sequence>
166        <xs:element ref="pyld:requestID" minOccurs="1" maxOccurs="1"/>
167        <xs:element ref="ei:resourceID" minOccurs="0" maxOccurs="1">
168          <xs:annotation>
169            <xs:documentation>If present, limits Avails returned to those for this Resource.</xs:documentation>
170          </xs:annotation>
171        </xs:element>
```

```xml
172        <xs:element ref="ei:requestorPartyID" minOccurs="1" maxOccurs="1"/>
173        <xs:element ref="ei:availID" minOccurs="1" maxOccurs="1"/>
174        <xs:element ref="emix:marketContext" minOccurs="0" maxOccurs="unbounded">
175          <xs:annotation>
176            <xs:documentation>If present, limits Avails returned to those within this Context.</xs:documentation>
177          </xs:annotation>
178        </xs:element>
179        <xs:element ref="ei:venID" minOccurs="1" maxOccurs="1"/>
180      </xs:sequence>
181    </xs:complexType>
182    <xs:element name="eiReplyAvail" type="pyld:EiReplyAvailType"/>
183    <xs:complexType name="EiReplyAvailType">
184      <xs:sequence>
185        <xs:element ref="ei:eiAvail" minOccurs="0" maxOccurs="1"/>
186        <xs:element ref="ei:eiResponse" minOccurs="1" maxOccurs="1"/>
187        <xs:element ref="ei:venID" minOccurs="1" maxOccurs="1"/>
188        <xs:element ref="ei:vtnID" minOccurs="0" maxOccurs="1"/>
189      </xs:sequence>
190    </xs:complexType>
191    <xs:element name="eiCancelAvail" type="pyld:EiCancelAvailType"/>
192    <xs:complexType name="EiCancelAvailType">
193      <xs:annotation>
194        <xs:documentation>Used to cancel the Avail referenced by the AvailID.</xs:documentation>
195      </xs:annotation>
196      <xs:sequence>
197        <xs:element ref="ei:availID" minOccurs="1" maxOccurs="1"/>
198        <xs:element ref="ei:venID" minOccurs="1" maxOccurs="1"/>
199      </xs:sequence>
200    </xs:complexType>
201    <xs:element name="eiCanceledAvail" type="pyld:EiCanceledAvailType"/>
202    <xs:complexType name="EiCanceledAvailType">
203      <xs:sequence>
204        <xs:element ref="ei:availID" minOccurs="1" maxOccurs="1"/>
205        <xs:element ref="ei:eiResponse" minOccurs="1" maxOccurs="1"/>
206      </xs:sequence>
207    </xs:complexType>
208    <!-- 3.0 Report Payloads -->
209    <xs:element name="eiCreateHistorian" type="pyld:EiCreateHistorianType"/>
210    <xs:complexType name="EiCreateHistorianType">
211      <xs:annotation>
212        <xs:documentation>Used to create a new Historian and start it recording indicated information</xs:documentation>
213      </xs:annotation>
214      <xs:sequence>
215        <xs:element ref="pyld:requestID" minOccurs="1" maxOccurs="1"/>
216        <xs:element ref="ei:eiReportRequest" minOccurs="1" maxOccurs="unbounded"/>
217        <xs:element ref="ei:partyID" minOccurs="1" maxOccurs="1"/>
218        <xs:element ref="ei:requestorPartyID" minOccurs="1" maxOccurs="1"/>
219        <xs:element ref="ei:vtnID" minOccurs="0" maxOccurs="1"/>
220      </xs:sequence>
221    </xs:complexType>
222    <xs:element name="eiCreatedHistorian" type="pyld:EiCreatedHistorianType"/>
223    <xs:annotation>
224      <xs:documentation>Used to reply to Create Historian.</xs:documentation>
225    </xs:annotation>
226    <xs:complexType name="EiCreatedHistorianType">
227      <xs:sequence>
228        <xs:element ref="ei:eiResponse" minOccurs="1" maxOccurs="1">
229          <xs:annotation>
230            <xs:documentation>contains requestID of historian request</xs:documentation>
231          </xs:annotation>
232        </xs:element>
233        <xs:element ref="ei:responses" minOccurs="0" maxOccurs="1"/>
```

```xml
234        <xs:element ref="ei:historianID" minOccurs="0" maxOccurs="unbounded"/>
235      </xs:sequence>
236    </xs:complexType>
237    <xs:element name="eiCancelHistorian" type="pyld:EiCancelHistorianType"/>
238    <xs:complexType name="EiCancelHistorianType">
239      <xs:annotation>
240        <xs:documentation>Used to cancel Historian recording, optionally requesting a final report </xs:documentation>
241      </xs:annotation>
242      <xs:sequence>
243        <xs:element ref="ei:historianID" minOccurs="1" maxOccurs="unbounded"/>
244        <xs:element ref="ei:eiTarget" minOccurs="1" maxOccurs="1">
245          <xs:annotation>
246            <xs:documentation>must be the same as the target of the Report Request</xs:documentation>
247          </xs:annotation>
248        </xs:element>
249        <xs:element ref="pyld:reportToFollow" minOccurs="1" maxOccurs="1"/>
250      </xs:sequence>
251    </xs:complexType>
252    <xs:element name="eiCanceledHistorian" type="pyld:EiCanceledHistorianType"/>
253    <xs:complexType name="EiCanceledHistorianType">
254      <xs:sequence>
255        <xs:element ref="ei:eiResponse" minOccurs="1" maxOccurs="1"/>
256        <xs:element ref="ei:responses" minOccurs="0" maxOccurs="1"/>
257        <xs:element ref="ei:historianID" minOccurs="0" maxOccurs="unbounded"/>
258      </xs:sequence>
259    </xs:complexType>
260    <xs:element name="eiRequestHistorian" type="pyld:EiRequestHistorianType"/>
261    <xs:complexType name="EiRequestHistorianType">
262      <xs:sequence>
263        <xs:element ref="pyld:requestID" minOccurs="1" maxOccurs="1"/>
264        <xs:element ref="ei:requestorPartyID" minOccurs="1" maxOccurs="1"/>
265        <xs:element ref="emix:marketContext" minOccurs="0" maxOccurs="unbounded"/>
266        <xs:element ref="ei:vtnID" minOccurs="1" maxOccurs="1">
267          <xs:annotation>
268            <xs:documentation>must be related to the vtn or Party that created the historian</xs:documentation>
269          </xs:annotation>
270        </xs:element>
271        <xs:element ref="xcal:interval" minOccurs="0" maxOccurs="1">
272          <xs:annotation>
273            <xs:documentation>If present, limits range of request to Histories that occur within Interval.</xs:documentation>
274          </xs:annotation>
275        </xs:element>
276        <xs:element ref="ei:partyID" minOccurs="0" maxOccurs="1"/>
277      </xs:sequence>
278    </xs:complexType>
279    <xs:element name="eiReplyHistorian" type="pyld:EiReplyHistorianType"/>
280    <xs:complexType name="EiReplyHistorianType">
281      <xs:sequence>
282        <xs:element ref="ei:eiResponse" minOccurs="1" maxOccurs="1">
283          <xs:annotation>
284            <xs:documentation>contains the requestID of the eiRequestHistorian</xs:documentation>
285          </xs:annotation>
286        </xs:element>
287        <xs:element ref="ei:responses" minOccurs="0" maxOccurs="1"/>
288        <xs:element ref="emix:marketContext" minOccurs="0" maxOccurs="unbounded"/>
289        <xs:element ref="ei:historianID" minOccurs="1" maxOccurs="1"/>
290      </xs:sequence>
291    </xs:complexType>
292    <xs:element name="eiCreateProjection" type="pyld:EiCreateProjectionType"/>
293    <xs:complexType name="EiCreateProjectionType">
294      <xs:sequence>
295        <xs:element ref="pyld:requestID" minOccurs="1" maxOccurs="1"/>
```

```xml
296          <xs:element ref="ei:eiReportRequest" minOccurs="1" maxOccurs="unbounded"/>
297          <xs:element ref="ei:partyID" minOccurs="1" maxOccurs="1"/>
298          <xs:element ref="ei:requestorPartyID" minOccurs="1" maxOccurs="1"/>
299          <xs:element ref="ei:vtnID" minOccurs="0" maxOccurs="1"/>
300        </xs:sequence>
301      </xs:complexType>
302      <xs:element name="eiCreatedProjection" type="pyld:EiCreatedProjectionType"/>
303      <xs:complexType name="EiCreatedProjectionType">
304        <xs:sequence>
305          <xs:element ref="ei:eiResponse" minOccurs="1" maxOccurs="1">
306            <xs:annotation>
307              <xs:documentation>contains requestID of projection request</xs:documentation>
308            </xs:annotation>
309          </xs:element>
310          <xs:element ref="ei:responses" minOccurs="0" maxOccurs="1"/>
311          <xs:element ref="ei:eiReportID" minOccurs="0" maxOccurs="unbounded">
312            <xs:annotation>
313              <xs:documentation>contains the refID of reports that are pending</xs:documentation>
314            </xs:annotation>
315          </xs:element>
316          <xs:element ref="ei:eiReport" minOccurs="0" maxOccurs="unbounded">
317            <xs:annotation>
318              <xs:documentation>contains the reports that are ready now</xs:documentation>
319            </xs:annotation>
320          </xs:element>
321        </xs:sequence>
322      </xs:complexType>
323      <xs:element name="eiCreateReport" type="pyld:EiCreateReportType"/>
324      <xs:complexType name="EiCreateReportType">
325        <xs:sequence>
326          <xs:element ref="pyld:requestID" minOccurs="1" maxOccurs="1"/>
327          <xs:element ref="ei:eiReportRequest" minOccurs="1" maxOccurs="unbounded"/>
328          <xs:element ref="ei:partyID" minOccurs="1" maxOccurs="1"/>
329          <xs:element ref="ei:requestorPartyID" minOccurs="1" maxOccurs="1"/>
330          <xs:element ref="ei:vtnID" minOccurs="0" maxOccurs="1"/>
331        </xs:sequence>
332      </xs:complexType>
333      <xs:element name="eiCreatedReport" type="pyld:EiCreatedReportType"/>
334      <xs:complexType name="EiCreatedReportType">
335        <xs:sequence>
336          <xs:element ref="ei:eiResponse" minOccurs="1" maxOccurs="1">
337            <xs:annotation>
338              <xs:documentation>contains refID of report request</xs:documentation>
339            </xs:annotation>
340          </xs:element>
341          <xs:element ref="ei:responses" minOccurs="0" maxOccurs="1"/>
342          <xs:element ref="ei:eiReportID" minOccurs="0" maxOccurs="unbounded">
343            <xs:annotation>
344              <xs:documentation>contains the refID of reports that are pending</xs:documentation>
345            </xs:annotation>
346          </xs:element>
347          <xs:element ref="ei:eiReport" minOccurs="0" maxOccurs="unbounded">
348            <xs:annotation>
349              <xs:documentation>contains the reports that are ready now</xs:documentation>
350            </xs:annotation>
351          </xs:element>
352        </xs:sequence>
353      </xs:complexType>
354      <xs:element name="eiCancelReport" type="pyld:EiCancelReportType"/>
355      <xs:complexType name="EiCancelReportType">
356        <xs:sequence>
357          <xs:element ref="pyld:requestID" minOccurs="1" maxOccurs="1"/>
```

```xml
358        <xs:element ref="ei:reportRequestID" minOccurs="0" maxOccurs="unbounded"/>
359        <xs:element ref="ei:eiReportID" minOccurs="1" maxOccurs="unbounded"/>
360        <xs:element ref="ei:eiTarget" minOccurs="0" maxOccurs="1"/>
361        <xs:element ref="ei:partyID" minOccurs="1" maxOccurs="1">
362          <xs:annotation>
363            <xs:documentation>self reference</xs:documentation>
364          </xs:annotation>
365        </xs:element>
366        <xs:element ref="pyld:reportToFollow" minOccurs="1" maxOccurs="1"/>
367      </xs:sequence>
368    </xs:complexType>
369    <xs:element name="eiCanceledReport" type="pyld:EiCanceledReportType"/>
370    <xs:complexType name="EiCanceledReportType">
371      <xs:sequence>
372        <xs:element ref="ei:eiResponse" minOccurs="1" maxOccurs="1"/>
373        <xs:element ref="ei:responses" minOccurs="0" maxOccurs="1"/>
374        <xs:element ref="ei:eiReportID" minOccurs="1" maxOccurs="unbounded"/>
375        <xs:element ref="ei:reportRequestID" minOccurs="0" maxOccurs="unbounded"/>
376      </xs:sequence>
377    </xs:complexType>
378    <xs:element name="eiUpdateReport" type="pyld:EiUpdateReportType"/>
379    <xs:complexType name="EiUpdateReportType">
380      <xs:sequence>
381        <xs:element ref="pyld:requestID" minOccurs="1" maxOccurs="1"/>
382        <xs:element ref="ei:eiReport" minOccurs="0" maxOccurs="unbounded"/>
383        <xs:element ref="ei:eiResponse" minOccurs="1" maxOccurs="1"/>
384        <xs:element ref="ei:responses" minOccurs="0" maxOccurs="1"/>
385      </xs:sequence>
386    </xs:complexType>
387    <xs:element name="eiUpdatedReport" type="pyld:EiUpdatedReportType"/>
388    <xs:complexType name="EiUpdatedReportType">
389      <xs:sequence>
390        <xs:element ref="ei:eiResponse" minOccurs="1" maxOccurs="1"/>
391      </xs:sequence>
392    </xs:complexType>
393    <xs:element name="eiRequestReport" type="pyld:EiRequestReportType"/>
394    <xs:complexType name="EiRequestReportType">
395      <xs:annotation>
396        <xs:documentation>Used to request for Report or Reports currently defined.</xs:documentation>
397      </xs:annotation>
398      <xs:sequence>
399        <xs:element ref="pyld:requestID" minOccurs="1" maxOccurs="1"/>
400        <xs:element ref="ei:requestorPartyID" minOccurs="1" maxOccurs="1"/>
401        <xs:element ref="ei:reportRequestID" minOccurs="0" maxOccurs="1"/>
402        <xs:element ref="ei:eiTarget" minOccurs="0" maxOccurs="1"/>
403        <xs:element ref="ei:vtnID" minOccurs="0" maxOccurs="1"/>
404        <xs:element ref="ei:partyID" minOccurs="0" maxOccurs="1"/>
405        <xs:element ref="xcal:interval" minOccurs="0" maxOccurs="1">
406          <xs:annotation>
407            <xs:documentation>If present, limits range of request to Reports that occur within Interval.</xs:documentation>
408          </xs:annotation>
409        </xs:element>
410      </xs:sequence>
411    </xs:complexType>
412    <xs:element name="eiReplyReport" type="pyld:EiReplyReportType"/>
413    <xs:complexType name="EiReplyReportType">
414      <xs:sequence>
415        <xs:element ref="ei:eiResponse" minOccurs="1" maxOccurs="1"/>
416        <xs:element ref="ei:responses" minOccurs="0" maxOccurs="1"/>
417        <xs:element ref="ei:eiReportID" minOccurs="0" maxOccurs="unbounded"/>
418      </xs:sequence>
419    </xs:complexType>
```

```xml
420      <!-- 4.0 Opt Payloads -->
421      <xs:element name="eiCreateOpt" type="pyld:EiCreateOptType"/>
422      <xs:complexType name="EiCreateOptType">
423        <xs:annotation>
424          <xs:documentation>Used to create an Opt, receiving back an Opt ID.</xs:documentation>
425        </xs:annotation>
426        <xs:sequence>
427          <xs:element ref="ei:eiOpt" minOccurs="1" maxOccurs="1"/>
428        </xs:sequence>
429      </xs:complexType>
430      <xs:element name="eiCreatedOpt" type="pyld:EiCreatedOptType"/>
431      <xs:complexType name="EiCreatedOptType">
432        <xs:sequence>
433          <xs:element ref="ei:eiResponse" minOccurs="1" maxOccurs="1"/>
434          <xs:element ref="ei:optID" minOccurs="0" maxOccurs="1"/>
435        </xs:sequence>
436      </xs:complexType>
437      <xs:element name="eiCancelOpt" type="pyld:EiCancelOptType"/>
438      <xs:complexType name="EiCancelOptType">
439        <xs:annotation>
440          <xs:documentation>Used to create an Opt, receiving back an Opt ID.</xs:documentation>
441        </xs:annotation>
442        <xs:sequence>
443          <xs:element ref="ei:optID" minOccurs="1" maxOccurs="1"/>
444          <xs:element ref="ei:venID" minOccurs="1" maxOccurs="1"/>
445        </xs:sequence>
446      </xs:complexType>
447      <xs:element name="eiCanceledOpt" type="pyld:EiCanceledOptType"/>
448      <xs:complexType name="EiCanceledOptType">
449        <xs:sequence>
450          <xs:element ref="ei:eiResponse" minOccurs="1" maxOccurs="1"/>
451          <xs:element ref="ei:optID" minOccurs="1" maxOccurs="1"/>
452        </xs:sequence>
453      </xs:complexType>
454      <xs:element name="eiRequestOpt" type="pyld:EiRequestOptType"/>
455      <xs:complexType name="EiRequestOptType">
456        <xs:sequence>
457          <xs:element ref="pyld:requestID" minOccurs="1" maxOccurs="1"/>
458          <xs:element ref="ei:venID" minOccurs="1" maxOccurs="1"/>
459          <xs:element ref="emix:marketContext" minOccurs="0" maxOccurs="1"/>
460          <xs:element ref="ei:optID" minOccurs="1" maxOccurs="1"/>
461          <xs:element ref="ei:requestorPartyID" minOccurs="1" maxOccurs="1"/>
462          <xs:element ref="ei:resourceID" minOccurs="0" maxOccurs="1"/>
463        </xs:sequence>
464      </xs:complexType>
465      <xs:element name="eiReplyOpt" type="pyld:EiReplyOptType"/>
466      <xs:complexType name="EiReplyOptType">
467        <xs:sequence>
468          <xs:element ref="ei:eiResponse" minOccurs="1" maxOccurs="1"/>
469          <xs:element ref="ei:venID" minOccurs="1" maxOccurs="1"/>
470          <xs:element ref="ei:vtnID" minOccurs="1" maxOccurs="1"/>
471          <xs:element ref="ei:eiOpt" minOccurs="0" maxOccurs="unbounded"/>
472        </xs:sequence>
473      </xs:complexType>
474      <!-- 5.0 Quote Payloads -->
475      <xs:element name="eiCreateQuote" type="pyld:EiCreateQuoteType"/>
476      <xs:complexType name="EiCreateQuoteType">
477        <xs:annotation>
478          <xs:documentation>Used to create and send a Quote.</xs:documentation>
479        </xs:annotation>
480        <xs:sequence>
481          <xs:element ref="pyld:requestID" minOccurs="1" maxOccurs="1"/>
```

```xml
482        <xs:element ref="ei:publisherPartyID" minOccurs="1" maxOccurs="1"/>
483        <xs:element ref="ei:subscriberPartyID" minOccurs="1" maxOccurs="1"/>
484        <xs:element ref="ei:eiQuote" minOccurs="1" maxOccurs="unbounded"/>
485      </xs:sequence>
486    </xs:complexType>
487    <xs:element name="eiCreatedQuote" type="pyld:EiCreatedQuoteType"/>
488    <xs:complexType name="EiCreatedQuoteType">
489      <xs:sequence>
490        <xs:element ref="ei:eiResponse" minOccurs="1" maxOccurs="1"/>
491        <xs:element ref="ei:responses" minOccurs="0" maxOccurs="1"/>
492        <xs:element ref="ei:subscriberPartyID" minOccurs="1" maxOccurs="1"/>
493        <xs:element ref="ei:publisherPartyID" minOccurs="0" maxOccurs="1"/>
494        <xs:element ref="ei:quoteID" minOccurs="0" maxOccurs="unbounded">
495          <xs:annotation>
496            <xs:documentation>If present, the response is limited to the quote[s] with respect to the counterparty with these IDs.
       </xs:documentation>
497          </xs:annotation>
498        </xs:element>
499      </xs:sequence>
500    </xs:complexType>
501    <xs:element name="eiCancelQuote" type="pyld:EiCancelQuoteType"/>
502    <xs:complexType name="EiCancelQuoteType">
503      <xs:annotation>
504        <xs:documentation>Used to cancel a Quote or Quotes.</xs:documentation>
505      </xs:annotation>
506      <xs:sequence>
507        <xs:element ref="pyld:requestID" minOccurs="1" maxOccurs="1"/>
508        <xs:element ref="ei:subscriberPartyID" minOccurs="0" maxOccurs="1"/>
509        <xs:element ref="ei:publisherPartyID" minOccurs="1" maxOccurs="1"/>
510        <xs:element ref="ei:quoteID" minOccurs="1" maxOccurs="unbounded"/>
511      </xs:sequence>
512    </xs:complexType>
513    <xs:element name="eiCanceledQuote" type="pyld:EiCanceledQuoteType"/>
514    <xs:complexType name="EiCanceledQuoteType">
515      <xs:sequence>
516        <xs:element ref="ei:eiResponse" minOccurs="1" maxOccurs="1"/>
517        <xs:element ref="ei:responses" minOccurs="0" maxOccurs="1"/>
518        <xs:element ref="ei:subscriberPartyID" minOccurs="0" maxOccurs="1"/>
519        <xs:element ref="ei:publisherPartyID" minOccurs="0" maxOccurs="1"/>
520      </xs:sequence>
521    </xs:complexType>
522    <xs:element name="eiRequestQuote" type="pyld:EiRequestQuoteType"/>
523    <xs:complexType name="EiRequestQuoteType">
524      <xs:annotation>
525        <xs:documentation>Used to request outstanding Quotes.</xs:documentation>
526      </xs:annotation>
527      <xs:sequence>
528        <xs:element ref="pyld:requestID" minOccurs="1" maxOccurs="1"/>
529        <xs:element ref="ei:requestorPartyID" minOccurs="1" maxOccurs="1"/>
530        <xs:element ref="ei:publisherPartyID" minOccurs="1" maxOccurs="1"/>
531        <xs:element ref="emix:marketContext" minOccurs="0" maxOccurs="unbounded"/>
532        <xs:element ref="ei:quoteID" minOccurs="0" maxOccurs="unbounded"/>
533        <xs:element ref="xcal:interval" minOccurs="0" maxOccurs="1">
534          <xs:annotation>
535            <xs:documentation>If present, limits range of request to Quotes for products that occur within Interval.</
       xs:documentation>
536          </xs:annotation>
537        </xs:element>
538      </xs:sequence>
539    </xs:complexType>
540    <xs:element name="eiReplyQuote" type="pyld:EiReplyQuoteType"/>
541    <xs:complexType name="EiReplyQuoteType">
```

```xml
542        <xs:sequence>
543          <xs:element ref="ei:eiResponse" minOccurs="1" maxOccurs="1"/>
544          <xs:element ref="ei:responses" minOccurs="0" maxOccurs="1"/>
545          <xs:element ref="ei:eiQuote" minOccurs="0" maxOccurs="unbounded"/>
546        </xs:sequence>
547      </xs:complexType>
548      <xs:element name="eiDistributeQuote" type="pyld:EiDistributeQuoteType"/>
549      <xs:complexType name="EiDistributeQuoteType">
550        <xs:annotation>
551          <xs:documentation>For price distribution through broadcast, the VTN-VEN links, or otherwise (e.g. passive placing on a
      web site for REST-style access).</xs:documentation>
552        </xs:annotation>
553        <xs:sequence>
554          <xs:element ref="pyld:requestID" minOccurs="1" maxOccurs="1"/>
555          <xs:element ref="ei:publisherPartyID" minOccurs="1" maxOccurs="1"/>
556          <xs:element ref="ei:eiTarget" minOccurs="1" maxOccurs="1"/>
557          <xs:element ref="ei:eiQuote" minOccurs="1" maxOccurs="unbounded"/>
558        </xs:sequence>
559      </xs:complexType>
560      <!-- 6.0 Registration Payloads -->
561      <xs:element name="eiCreatePartyRegistration" type="pyld:EiCreatePartyRegistrationType"/>
562      <xs:complexType name="EiCreatePartyRegistrationType">
563        <xs:annotation>
564          <xs:documentation>Used to create and send a Party Registration request.</xs:documentation>
565        </xs:annotation>
566        <xs:sequence>
567          <xs:element ref="pyld:requestID" minOccurs="1" maxOccurs="1"/>
568          <xs:element ref="ei:registreePartyID" minOccurs="0" maxOccurs="1"/>
569          <xs:element ref="ei:eiRegistrationInfo" minOccurs="1" maxOccurs="1"/>
570        </xs:sequence>
571      </xs:complexType>
572      <xs:element name="eiCreatedPartyRegistration" type="pyld:EiCreatedPartyRegistrationType"/>
573      <xs:complexType name="EiCreatedPartyRegistrationType">
574        <xs:sequence>
575          <xs:element ref="ei:eiResponse" minOccurs="1" maxOccurs="1"/>
576          <xs:element ref="ei:registrarPartyID" minOccurs="0" maxOccurs="1"/>
577          <xs:element ref="ei:registrationID" minOccurs="0" maxOccurs="1"/>
578          <xs:element ref="ei:registreePartyID" minOccurs="0" maxOccurs="1"/>
579        </xs:sequence>
580      </xs:complexType>
581      <xs:element name="eiRequestPartyRegistration" type="pyld:EiRequestPartyRegistrationType"/>
582      <xs:annotation>
583        <xs:documentation>Request for information about extant registrations.</xs:documentation>
584      </xs:annotation>
585      <xs:complexType name="EiRequestPartyRegistrationType">
586        <xs:sequence>
587          <xs:element ref="pyld:requestID" minOccurs="1" maxOccurs="1"/>
588          <xs:element ref="ei:registreePartyID" minOccurs="1" maxOccurs="1"/>
589          <xs:element ref="ei:registrarPartyID" minOccurs="0" maxOccurs="1"/>
590          <xs:element ref="ei:requestorPartyID" minOccurs="1" maxOccurs="1"/>
591          <xs:element ref="ei:registrationID" minOccurs="0" maxOccurs="unbounded"/>
592          <xs:element ref="xcal:interval" minOccurs="0" maxOccurs="1">
593            <xs:annotation>
594              <xs:documentation>If present, limits range of request to registrations within Interval.</xs:documentation>
595            </xs:annotation>
596          </xs:element>
597        </xs:sequence>
598      </xs:complexType>
599      <xs:element name="eiReplyPartyRegistration" type="pyld:EiReplyPartyRegistrationType"/>
600      <xs:complexType name="EiReplyPartyRegistrationType">
601        <xs:sequence>
602          <xs:element ref="ei:eiRegistration" minOccurs="0" maxOccurs="unbounded"/>
```

```xml
603        <xs:element ref="ei:eiResponse" minOccurs="1" maxOccurs="1"/>
604        <xs:element ref="ei:responses" minOccurs="0" maxOccurs="1"/>
605      </xs:sequence>
606    </xs:complexType>
607    <xs:element name="eiCancelPartyRegistration" type="pyld:EiCancelPartyRegistrationType"/>
608    <xs:complexType name="EiCancelPartyRegistrationType">
609      <xs:annotation>
610        <xs:documentation>Used to cancel one or more Party Registrations.</xs:documentation>
611      </xs:annotation>
612      <xs:sequence>
613        <xs:element ref="pyld:requestID" minOccurs="1" maxOccurs="1"/>
614        <xs:element ref="ei:registreePartyID" minOccurs="1" maxOccurs="1"/>
615        <xs:element ref="ei:registrarPartyID" minOccurs="1" maxOccurs="1"/>
616        <xs:element ref="ei:registrationID" minOccurs="1" maxOccurs="unbounded"/>
617      </xs:sequence>
618    </xs:complexType>
619    <xs:element name="eiCanceledPartyRegistration" type="pyld:EiCanceledPartyRegistrationType"/>
620    <xs:complexType name="EiCanceledPartyRegistrationType">
621      <xs:sequence>
622        <xs:element ref="ei:respondingPartyID" minOccurs="1" maxOccurs="1"/>
623        <xs:element ref="ei:registreePartyID" minOccurs="1" maxOccurs="1"/>
624        <xs:element ref="ei:registrarPartyID" minOccurs="1" maxOccurs="1"/>
625        <xs:element ref="ei:eiResponse" minOccurs="0" maxOccurs="unbounded"/>
626        <xs:element ref="ei:responses" minOccurs="0" maxOccurs="unbounded"/>
627      </xs:sequence>
628    </xs:complexType>
629    <!-- 7.0 Market Context Payloads -->
630    <xs:element name="eiRequestEiMarketContext" type="pyld:EiRequestEiMarketContextType"/>
631    <xs:complexType name="EiRequestEiMarketContextType">
632      <xs:sequence>
633        <xs:element ref="pyld:requestID" minOccurs="1" maxOccurs="1"/>
634        <xs:element ref="emix:marketContext" minOccurs="1" maxOccurs="unbounded"/>
635        <xs:element ref="ei:venID" minOccurs="0" maxOccurs="1">
636          <xs:annotation>
637            <xs:documentation>VEN for which Resource Status is requested.</xs:documentation>
638          </xs:annotation>
639        </xs:element>
640        <xs:element ref="ei:vtnID" minOccurs="0" maxOccurs="1"/>
641        <xs:element ref="ei:resourceID" minOccurs="0" maxOccurs="unbounded">
642          <xs:annotation>
643            <xs:documentation>Resource(s) for which status is requested.</xs:documentation>
644          </xs:annotation>
645        </xs:element>
646        <xs:element ref="ei:partyID" minOccurs="0" maxOccurs="1"/>
647      </xs:sequence>
648    </xs:complexType>
649    <xs:element name="eiReplyEiMarketContext" type="pyld:EiReplyEiMarketContextType"/>
650    <xs:complexType name="EiReplyEiMarketContextType">
651      <xs:sequence>
652        <xs:element ref="ei:eiResponse" minOccurs="1" maxOccurs="1"/>
653        <xs:element ref="ei:responses" minOccurs="0" maxOccurs="1"/>
654      </xs:sequence>
655    </xs:complexType>
656    <!-- 8.0 Tender Payloads -->
657    <xs:element name="eiCreateTender" type="pyld:EiCreateTenderType"/>
658    <xs:complexType name="EiCreateTenderType">
659      <xs:annotation>
660        <xs:documentation>Used to create and send a Tender.</xs:documentation>
661      </xs:annotation>
662      <xs:sequence>
663        <xs:element ref="pyld:requestID" minOccurs="1" maxOccurs="1"/>
664        <xs:element ref="ei:partyID" minOccurs="1" maxOccurs="1"/>
```

```xml
665        <xs:element ref="ei:counterPartyID" minOccurs="1" maxOccurs="1"/>
666        <xs:element ref="ei:eiTender" minOccurs="1" maxOccurs="unbounded"/>
667      </xs:sequence>
668    </xs:complexType>
669    <xs:element name="eiCreatedTender" type="pyld:EiCreatedTenderType"/>
670    <xs:complexType name="EiCreatedTenderType">
671      <xs:sequence>
672        <xs:element ref="ei:eiResponse" minOccurs="1" maxOccurs="1"/>
673        <xs:element ref="ei:responses" minOccurs="1" maxOccurs="1"/>
674        <xs:element ref="ei:partyID" minOccurs="1" maxOccurs="1"/>
675        <xs:element ref="ei:counterPartyID" minOccurs="0" maxOccurs="1"/>
676        <xs:element ref="ei:tenderID" minOccurs="0" maxOccurs="unbounded"/>
677      </xs:sequence>
678    </xs:complexType>
679    <xs:element name="eiRequestTender" type="pyld:EiRequestTenderType"/>
680    <xs:complexType name="EiRequestTenderType">
681      <xs:annotation>
682        <xs:documentation>Used to Request outstanding Tenders.</xs:documentation>
683      </xs:annotation>
684      <xs:sequence>
685        <xs:element ref="pyld:requestID" minOccurs="1" maxOccurs="1"/>
686        <xs:element ref="ei:partyID" minOccurs="1" maxOccurs="1"/>
687        <xs:element ref="ei:counterPartyID" minOccurs="0" maxOccurs="unbounded"/>
688        <xs:element ref="ei:requestorPartyID" minOccurs="1" maxOccurs="1"/>
689        <xs:element ref="emix:marketContext" minOccurs="0" maxOccurs="unbounded"/>
690        <xs:element ref="ei:tenderID" minOccurs="0" maxOccurs="unbounded"/>
691        <xs:element ref="xcal:interval" minOccurs="0" maxOccurs="1">
692          <xs:annotation>
693            <xs:documentation>If present, limits range of request to tender made for products that occur within Interval.</xs:documentation>
694          </xs:annotation>
695        </xs:element>
696      </xs:sequence>
697    </xs:complexType>
698    <xs:element name="eiReplyTender" type="pyld:EiReplyTenderType"/>
699    <xs:complexType name="EiReplyTenderType">
700      <xs:sequence>
701        <xs:element ref="ei:eiResponse" minOccurs="1" maxOccurs="1"/>
702        <xs:element ref="ei:responses" minOccurs="0" maxOccurs="1"/>
703        <xs:element ref="ei:eiTender" minOccurs="0" maxOccurs="unbounded"/>
704      </xs:sequence>
705    </xs:complexType>
706    <xs:element name="eiCancelTender" type="pyld:EiCancelTenderType"/>
707    <xs:complexType name="EiCancelTenderType">
708      <xs:annotation>
709        <xs:documentation>Used to Cancel one or more Tenders.</xs:documentation>
710      </xs:annotation>
711      <xs:sequence>
712        <xs:element ref="pyld:requestID" minOccurs="1" maxOccurs="1"/>
713        <xs:element ref="ei:partyID" minOccurs="1" maxOccurs="1"/>
714        <xs:element ref="ei:counterPartyID" minOccurs="0" maxOccurs="1"/>
715        <xs:element ref="ei:tenderID" minOccurs="1" maxOccurs="unbounded"/>
716      </xs:sequence>
717    </xs:complexType>
718    <xs:element name="eiCanceledTender" type="pyld:EiCanceledTenderType"/>
719    <xs:complexType name="EiCanceledTenderType">
720      <xs:sequence>
721        <xs:element ref="ei:eiResponse" minOccurs="1" maxOccurs="1"/>
722        <xs:element ref="ei:responses" minOccurs="0" maxOccurs="1"/>
723        <xs:element ref="ei:partyID" minOccurs="1" maxOccurs="1"/>
724        <xs:element ref="ei:counterPartyID" minOccurs="0" maxOccurs="1"/>
725      </xs:sequence>
```

```xml
726        </xs:complexType>
727        <xs:element name="eiDistributeTender" type="pyld:EiDistributeTenderType"/>
728        <xs:complexType name="EiDistributeTenderType">
729          <xs:annotation>
730            <xs:documentation>Used for Broadcast of Tenders.</xs:documentation>
731          </xs:annotation>
732          <xs:sequence>
733            <xs:element ref="pyld:requestID" minOccurs="1" maxOccurs="1"/>
734            <xs:element ref="ei:partyID" minOccurs="1" maxOccurs="1"/>
735            <xs:element ref="ei:eiTarget" minOccurs="1" maxOccurs="1"/>
736            <xs:element ref="ei:eiTender" minOccurs="1" maxOccurs="unbounded"/>
737          </xs:sequence>
738        </xs:complexType>
739        <!-- 9.0 Transaction Payloads -->
740        <xs:element name="eiCreateTransaction" type="pyld:EiCreateTransactionType"/>
741        <xs:complexType name="EiCreateTransactionType">
742          <xs:annotation>
743            <xs:documentation>Used to create and send a Transaction.</xs:documentation>
744          </xs:annotation>
745          <xs:sequence>
746            <xs:element ref="pyld:requestID" minOccurs="1" maxOccurs="1"/>
747            <xs:element ref="ei:partyID" minOccurs="1" maxOccurs="1"/>
748            <xs:element ref="ei:counterPartyID" minOccurs="1" maxOccurs="1"/>
749            <xs:element ref="ei:eiTransaction" minOccurs="1" maxOccurs="unbounded"/>
750          </xs:sequence>
751        </xs:complexType>
752        <xs:element name="eiCreatedTransaction" type="pyld:EiCreatedTransactionType"/>
753        <xs:complexType name="EiCreatedTransactionType">
754          <xs:sequence>
755            <xs:element ref="ei:counterPartyID" minOccurs="1" maxOccurs="1"/>
756            <xs:element ref="ei:partyID" minOccurs="1" maxOccurs="1"/>
757            <xs:element ref="ei:eiResponse" minOccurs="1" maxOccurs="1"/>
758            <xs:element ref="ei:responses" minOccurs="0" maxOccurs="1"/>
759            <xs:element ref="ei:transactionID" minOccurs="0" maxOccurs="unbounded"/>
760          </xs:sequence>
761        </xs:complexType>
762        <xs:element name="eiRequestTransaction" type="pyld:EiRequestTransactionType"/>
763        <xs:complexType name="EiRequestTransactionType">
764          <xs:annotation>
765            <xs:documentation>Request extant Transactions.</xs:documentation>
766          </xs:annotation>
767          <xs:sequence>
768            <xs:element ref="pyld:requestID" minOccurs="1" maxOccurs="1"/>
769            <xs:element ref="ei:partyID" minOccurs="1" maxOccurs="1"/>
770            <xs:element ref="ei:counterPartyID" minOccurs="0" maxOccurs="unbounded"/>
771            <xs:element ref="ei:requestorPartyID" minOccurs="1" maxOccurs="1"/>
772            <xs:element ref="emix:marketContext" minOccurs="0" maxOccurs="unbounded"/>
773            <xs:element ref="ei:transactionID" minOccurs="0" maxOccurs="unbounded"/>
774            <xs:element ref="xcal:interval" minOccurs="0" maxOccurs="1">
775              <xs:annotation>
776                <xs:documentation>If present, limits range of request to transactions that occur within Interval.</xs:documentation>
777              </xs:annotation>
778            </xs:element>
779          </xs:sequence>
780        </xs:complexType>
781        <xs:element name="eiReplyTransaction" type="pyld:EiReplyTransactionType"/>
782        <xs:complexType name="EiReplyTransactionType">
783          <xs:sequence>
784            <xs:element ref="ei:eiResponse" minOccurs="1" maxOccurs="1"/>
785            <xs:element ref="ei:responses" minOccurs="0" maxOccurs="1"/>
786            <xs:element ref="ei:eiTransaction" minOccurs="0" maxOccurs="unbounded"/>
787          </xs:sequence>
```

```xml
788        </xs:complexType>
789        <!-- 10.0 Enrollment Payloads -->
790        <xs:element name="eiCreateEnroll" type="pyld:EiCreateEnrollType"/>
791        <xs:complexType name="EiCreateEnrollType">
792          <xs:annotation>
793            <xs:documentation>Used to create and send a Enrollment.</xs:documentation>
794          </xs:annotation>
795          <xs:sequence>
796            <xs:element ref="pyld:requestID" minOccurs="1" maxOccurs="1"/>
797            <xs:element ref="enrl:enrolleePartyID" minOccurs="1" maxOccurs="1"/>
798            <xs:element ref="enrl:eiEnrollment" minOccurs="1" maxOccurs="1"/>
799          </xs:sequence>
800        </xs:complexType>
801        <xs:element name="eiCreatedEnroll" type="pyld:EiCreatedEnrollType"/>
802        <xs:complexType name="EiCreatedEnrollType">
803          <xs:sequence>
804            <xs:element ref="ei:eiResponse" minOccurs="1" maxOccurs="1"/>
805            <xs:element ref="enrl:enrollmentResponses" minOccurs="0" maxOccurs="1"/>
806            <xs:element ref="enrl:enrollAdminPartyID" minOccurs="1" maxOccurs="1"/>
807            <xs:element ref="enrl:enrollmentID" minOccurs="0" maxOccurs="unbounded"/>
808          </xs:sequence>
809        </xs:complexType>
810        <xs:element name="eiRequestEnroll" type="pyld:EiRequestEnrollType"/>
811        <xs:complexType name="EiRequestEnrollType">
812          <xs:annotation>
813            <xs:documentation>Used to request outstanding Enrollment information.</xs:documentation>
814          </xs:annotation>
815          <xs:sequence>
816            <xs:element ref="pyld:requestID" minOccurs="1" maxOccurs="1"/>
817            <xs:element ref="enrl:enrollAdminPartyID" minOccurs="0" maxOccurs="unbounded"/>
818            <xs:element ref="enrl:enrolleePartyID" minOccurs="1" maxOccurs="1"/>
819            <xs:element ref="ei:requestorPartyID" minOccurs="1" maxOccurs="1"/>
820            <xs:element ref="enrl:enrollmentID" minOccurs="0" maxOccurs="unbounded"/>
821            <xs:element ref="emix:marketContext" minOccurs="0" maxOccurs="unbounded"/>
822          </xs:sequence>
823        </xs:complexType>
824        <xs:element name="eiReplyEnroll" type="pyld:EiReplyEnrollType"/>
825        <xs:complexType name="EiReplyEnrollType">
826          <xs:sequence>
827            <xs:element ref="ei:eiResponse" minOccurs="1" maxOccurs="1"/>
828            <xs:element ref="enrl:enrollmentResponses" minOccurs="0" maxOccurs="1"/>
829            <xs:element ref="enrl:eiEnrollment" minOccurs="0" maxOccurs="1"/>
830          </xs:sequence>
831        </xs:complexType>
832        <xs:element name="eiCancelEnroll" type="pyld:EiCancelEnrollType"/>
833        <xs:complexType name="EiCancelEnrollType">
834          <xs:annotation>
835            <xs:documentation>Used to cancel one or more Enrollments.</xs:documentation>
836          </xs:annotation>
837          <xs:sequence>
838            <xs:element ref="pyld:requestID" minOccurs="1" maxOccurs="1"/>
839            <xs:element ref="enrl:enrolleePartyID" minOccurs="1" maxOccurs="1"/>
840            <xs:element ref="enrl:enrollmentID" minOccurs="1" maxOccurs="unbounded"/>
841          </xs:sequence>
842        </xs:complexType>
843        <xs:element name="eiCanceledEnroll" type="pyld:EiCanceledEnrollType"/>
844        <xs:complexType name="EiCanceledEnrollType">
845          <xs:sequence>
846            <xs:element ref="ei:eiResponse" minOccurs="1" maxOccurs="1"/>
847            <xs:element ref="ei:responses" minOccurs="0" maxOccurs="1"/>
848          </xs:sequence>
849        </xs:complexType>
```

```xml
850        <!-- 11.0 Delivery Payloads -->
851        <xs:element name="eiCreateDelivery" type="pyld:EiCreateDeliveryType"/>
852        <xs:complexType name="EiCreateDeliveryType">
853          <xs:annotation>
854            <xs:documentation>Request for usage or generation [delivery] at an EMIXInterface by a requestor Party, specifying
           interval, what is to be measured, and the direction for the measurement.</xs:documentation>
855          </xs:annotation>
856          <xs:sequence>
857            <xs:element ref="pyld:requestID" minOccurs="1" maxOccurs="1"/>
858            <xs:element ref="ei:requestorPartyID" minOccurs="1" maxOccurs="1"/>
859            <xs:element ref="ei:eiDelivery" minOccurs="1" maxOccurs="unbounded"/>
860          </xs:sequence>
861        </xs:complexType>
862        <xs:element name="eiCreatedDelivery" type="pyld:EiCreatedDeliveryType"/>
863        <xs:complexType name="EiCreatedDeliveryType">
864          <xs:sequence>
865            <xs:element ref="ei:eiResponse" minOccurs="1" maxOccurs="1"/>
866            <xs:element ref="ei:responses" minOccurs="0" maxOccurs="1"/>
867            <xs:element ref="ei:eiDelivery" minOccurs="0" maxOccurs="unbounded"/>
868          </xs:sequence>
869        </xs:complexType>
870        <!-- 12.0 Payload Specific elements -->
871        <xs:element name="eventFilter" type="pyld:EventFilterType"/>
872        <xs:simpleType name="EventFilterType">
873          <xs:annotation>
874            <xs:documentation>Used to restrict the Events exchanged in Event Requests.</xs:documentation>
875          </xs:annotation>
876          <xs:restriction base="xs:token">
877            <xs:enumeration value="active">
878              <xs:annotation>
879                <xs:documentation>An event qualifies if the Active Interval coincides with the Request. If specified with an
           accompanying Interval, an Event qualifies if any part of the Active Interval occurs within the specifying Interval; without
           accompanying Interval, "now" is treated as an infinitesimal Interval with a current starting date and time.</xs:documentation>
880              </xs:annotation>
881            </xs:enumeration>
882            <xs:enumeration value="pending">
883              <xs:annotation>
884                <xs:documentation>An event qualifies if the Active Interval starting date and time is in the future. If specified with an
           accompanying Interval, the Event qualifies if the Active Interval has not started (is not Active) at the Start of the Interval, and the
           Active Interval start is within the bounds of the specifying Interval.</xs:documentation>
885              </xs:annotation>
886            </xs:enumeration>
887            <xs:enumeration value="all">
888              <xs:annotation>
889                <xs:documentation>An event qualifies if it would qualify as either Active or Pending.</xs:documentation>
890              </xs:annotation>
891            </xs:enumeration>
892            <xs:enumeration value="completed">
893              <xs:annotation>
894                <xs:documentation>An Event qualifies if the Active Interval is completed before the Request. If specified with an
           accompanying Interval, and Event qualifies if the end of the Active Interval before the start of the Requesting Interval.
           Conforming profiles MAY return a NULL set in response to a Request for Completed Intervals, as there is no requirement to
           store or be able to retrieve Completed Events.</xs:documentation>
895              </xs:annotation>
896            </xs:enumeration>
897            <xs:enumeration value="cancelled">
898              <xs:annotation>
899                <xs:documentation>An Event qualifies if it has been Cancelled. If specified with an accompanying Interval, and
           Event qualifies if the Event would have qualified as Active during the Interval. Conforming profiles MAY return a NULL set in
           response to a request for Completed Intervals as there is no requirement to store or be able to retrieve Cancelled Events.</
           xs:documentation>
900              </xs:annotation>
```

```xml
901          </xs:enumeration>
902        </xs:restriction>
903      </xs:simpleType>
904      <xs:element name="requestID" substitutionGroup="ei:refID"/>
905      <xs:element name="replyLimit" type="xs:unsignedInt">
906        <xs:annotation>
907          <xs:documentation>Limits Reply to first N matching artifacts.</xs:documentation>
908        </xs:annotation>
909      </xs:element>
910      <xs:element name="reportToFollow" type="xs:boolean">
911        <xs:annotation>
912          <xs:documentation>Indicates if report (in the form of UpdateReport) to be returned following cancellation of Report or Historian.</xs:documentation>
913        </xs:annotation>
914      </xs:element>
915    </xs:schema>
916
```