RAI – Data Sheet
(Request for Arranged Interchange)
Required and Correctable Data

Version 1

- The following information is based upon using NERC’s E-Tag or a similar tool to initiate the RAI.
- **Statements in blue indicate a change from NERC’s Appendix 3A4.**
  - The acronym RAI has replaced the word Transaction, used by NERC in Appendix 3A4, unless otherwise noted.
  - All headers and footers used in Appendix 3A4 have been removed.

A. New Requests for Arranged Interchange

B. Curtailments and Reloads (Reliability Profile Modifications)

C. Market Related Profile Modifications (Market Adjustment)

A. New Requests for Arranged Interchange

A **new RAI** is an RAI that has not yet been implemented or confirmed for implementation. Such RAI must be presented to those entities that are responsible for the implementation of the RAI in order that they may evaluate the Request and determine whether or not it can be implemented. The following information is to be used to describe such a RAI.

1. **Market Information**

   - **Market Redispatch has been removed from this section formerly 1.1 in 3A4.**

   1.1. **Financial Path (Required)** – the description of financially responsible parties for the transaction in order. This will typically start with a GCA and finish with a LCA, with optionally Intermediate PSE’s between the two.

   1.1.1. **Energy Title Holder(s) (Required)** – the identity of the entities financially responsible to take and/or deliver the energy as described in the physical path. This will typically start with a GCA and finish with a LCA, with optionally Intermediate PSE’s between the two.

   - In section 1.1.1 above GCA, LCA, and PSE were used to replace Generation Providing Entity, LOAD SERVING ENTITY, and PURCHASING-SELLING ENTITIES.

   1.1.1.1. Energy Product Type (Correctable) – the type of energy delivered by the Energy Title Holder.

   1.1.1.2. Contract Number(s) (Correctable) – reference to a TRANSACTION entered into by the Energy Title Holder with one or more other participants in the RAI.

   1.1.1.3. Miscellaneous Information (Correctable) – information provided at the author’s option regarding the RAI.

2. **Physical Information**

   2.1. **Physical Path (Required)** – the description of physically scheduling parties for the transaction in order and related to the financially responsible parties described above. This will always contain a Generation segment, at least one Transmission segment, and a LOAD segment.
2.1.1. **Generation (Required)** – set of data describing the physical and contractual characteristics of the energy source.

2.1.1.1. **Resource Service Point (Required)** – the physical point at which the energy is being generated. This may vary in granularity, dependent on local business practices.

2.1.1.2. **Contract Number(s) (Correctable)** – reference to a schedule or agreement entered into by the Generation Providing Entity and the Generator Operator.

2.1.1.3. **Miscellaneous Information (Correctable)** – information provided at the author’s option regarding the RAI.

2.1.1.4. **Energy Profile (Required)** – energy to be produced by the generator for this RAI.

2.1.2. **Energy Profile (Required)** – energy to be produced by the generator for this RAI.

2.1.3. **Transmission (Required)** – set of data describing the physical and contractual characteristics of a wheel (import, export, or through).

2.1.3.1 **Transmission Provider (Required)** – the identity of the transmission provider that is wheeling the energy.

- **Point of Receipt - POR (Correctable)** – valid Point of Receipt for scheduled Transmission Reservation.

- **Changed POR above to a bullet item and added POR**

- **Point of Delivery - POD (Correctable)** – valid Point of Delivery for scheduled Transmission Reservation.

- **Added POD to the above**

- **Miscellaneous Information (Correctable)** – information provided at the author’s option regarding the RAI.

- **Scheduling Entity(ies) (Correctable)** – entities that are physically scheduling interchange on behalf of the TRANSMISSION PROVIDER in order to provide wheeling services.

- **Loss Provision Information (Required) (Correctable)** – Information describing the manner in which losses are accounted for. Losses will either be paid back In-Kind or Financially.

  - **Removed the following from the above losses provision:**

  Information describing the manner in which losses are accounted when they are not scheduled as in-kind megawatt distributions through the original transaction. Types may be financial (paid in dollars based on tariff provisions), internal (scheduled in megawatts to the TRANSMISSION PROVIDER from a resource inside the TRANSMISSION PROVIDER’S CONTROL AREA), or external (scheduled in megawatts to the TRANSMISSION PROVIDER from a resource outside the TRANSMISSION PROVIDER’S CONTROL AREA). If internal or external, must specify contract numbers or TRANSACTION IDs.

- **Miscellaneous Information (Correctable)** – information provided at the author’s option regarding the RAI.

- **POR and POD Profiles (Required)** – schedule of Energy Flow imported at the Point of Receipt and Exported at the Point of Delivery.
• Transmission Reservation Number(s) (Required) (Correctable) – reference to a particular transmission reservation being used to provide transmission capacity to support the transaction being described.
  o Continued the use of bullets until the LOAD section for items below.
  o Transmission Product (Required) (Correctable) – Specifies the NERC Priority.
  o Substituted NERC Priority for the following in the above: firmness of service associated with the transmission reservation being used.
  o Transmission Customer (Required) (Correctable) – identifies the entity that purchased and holds the transmission reservation being presented for use.
  o Transmission Reservation Profile (Required) - information describing the transmission reservation commitment associated with the TRANSMISSION PROVIDER.
    ▪ Committed Transmission Reservation Level (Required) – schedule of transmission reservation committed by the Transmission Customer for use for this RAI.

2.1.4. Load (Required) – set of data describing the physical and contractual characteristics of the energy sink.

2.1.4.1. Resource Service Point (Required) – the physical point at which the energy is being consumed. This may vary in granularity, dependent on local business practices.

2.1.4.2. Contract Number(s) (Correctable) – reference to a schedule or agreement entered into by the Load Serving Entity and the Load and/or Distributor.

2.1.4.3. Miscellaneous Information (Correctable) – information provided at the author’s option regarding the RAI.

2.1.4.4. Energy Profile (Required) – energy to be consumed by the load for this RAI.
Using Multiple Transmission Reservations to Support a Single Leg of an Interchange Transaction

The use of multiple transmission reservations to support a single leg of an RAI is known as transmission stacking. There are two types of transmission stacking:

- Vertical stacking, in which a Transmission Customer combines multiple reservations to achieve a certain net level of transmission capacity, and
- Horizontal stacking, in which a Transmission Customer combines multiple reservations to achieve a certain transmission capacity coverage over time.

The following diagrams illustrate these concepts more fully. In both cases, the assumed need is 100 MW of transmission capacity for hours 06:00 through 22:00.

**Vertical Stacking**

<table>
<thead>
<tr>
<th>Time</th>
<th>Reservation 12345 (50MW from 6:00 – 22:00)</th>
<th>Reservation 67890 (50MW from 6:00 – 22:00)</th>
</tr>
</thead>
<tbody>
<tr>
<td>06:00</td>
<td>50MW</td>
<td>50MW</td>
</tr>
<tr>
<td>14:00</td>
<td>0MW</td>
<td>0MW</td>
</tr>
<tr>
<td>22:00</td>
<td>0MW</td>
<td>50MW</td>
</tr>
</tbody>
</table>

**Horizontal Stacking**

<table>
<thead>
<tr>
<th>Time</th>
<th>Reservation 12345 (100 MW from 6:00 – 14:00)</th>
<th>Reservation 67890 (100 MW from 14:00 – 22:00)</th>
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<td>50MW</td>
<td>50MW</td>
</tr>
<tr>
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<td>0MW</td>
<td>0MW</td>
</tr>
</tbody>
</table>

Should a customer elect to utilize stacking to support their RAI, they must understand the following requirements:

- Stacks MUST be described through fully qualified profiles for each reservation being used
- At no point may the coverage described by the stack be less than the transmission capacity needed for the RAI’s energy flow
B. Curtailments and Reloads (Reliability Related Profile Modifications)

Curtailments and Reloads are special kinds of modifications to an Arranged Interchange transaction’s energy profile based on reliability concerns. Such modifications must be presented to those entities that are responsible for the implementation of the modification in order that they may evaluate the RAI and determine whether or not the modification can be implemented. The following information must be used to describe such a modification.

- The Implemented Interchange being curtailed or reloaded.
- Replaced Transaction with the words IMPLEMENTED INTERCHANGE.
- All necessary profile changes to set the maximum flow allowed during the appropriate hours
- A contact person that initiated the curtailment or reload, and
- A description of the necessity for the schedule change.

C. Market-Related Profile Modifications (Market Adjustment)

- Added Market Adjustment to the above.

Profile Modifications are changes to a RAI’s energy profile based on market desires. Such modifications must be presented to those entities that are responsible for the implementation of the modification in order that they may evaluate the RAI and determine whether or not the modification can be implemented. The following information must be used to describe such a modification.

- The RAI being modified
- All necessary profile changes to set the transmission capacity or energy flow to the desired levels during the appropriate hours, and
- A contact person that initiated the modification.