

Elements - Manage Mediation

CDG's Mediation element is a state-of-the-art solution for conquering the challenges associated with collecting unending streams of data from multiple sources using different formats, protocols, and time frames, and then processing and consolidating that data into files for invoicing, accounting, auditing, archiving, and reporting. Our Mediation system can help you filter, process, track, analyze, audit, and distribute your data with confidence.

OVERVIEW

Mediation is a critical tool in billing wisely. Your goal is to consolidate and correlate an unending stream. CDG's Mediation ensures that usage information is collected effectively and prepared for downstream distribution, so tasks like billing can be initiated and completed in a timely manner, with dependable accuracy and clarity.

Mediation receives data from switches and other network systems and converts the information to manageable formats for billing, auditing, and reporting purposes. Mediation filters out irrelevant data and correlates and organizes your call report data. Billing is easily reconciled and disputes are settled without delay. Mediation also generates reports that describe call volume, origin, types of service, and other vital details to use for planning and allocation and provides custom usage search and easy-to-use query features for detailed tracking and analysis.

FEATURES

Flexible Business Rules Mediation allows for the customization of business rules used to filter, edit, and rate call detail records.

Event Notification Provide system-generated messages about job statuses, potential processing issues, and general information to selected personnel.

Data Warehousing Multiple usage data warehousing options with data mining and analytics tools.

Automated Input Validation System

- The input file scanner agent wakes at adjustable time intervals to scan for available inputs and schedules them to be processed.
- The anomaly file scanner agent wakes at adjustable time intervals to scan for files which have not been recognized as valid inputs by the input scanner. The

agent then alerts the appropriate personnel to a possible issue.

- The file verification agent wakes at adjustable time intervals to verify that all inputs have been received and processed. If an expected input has not been received, the appropriate personnel are alerted.

Switch Compatibility

- Traditional switches, such as Northern, Lucent, Siemens, and Mitel.
- Soft switches, such as Taqua, GENBAND, Metaswitch, REDCOM, Siemens, and Centile.
- VOD Servers, such as Myrio, Motorola, and Conklin.

Data Format Compatibility

- Automatic Message Accounting (AMA)
- Automatic Message Accounting Data Networking Systems (AMADNS)
- Exchange Message Interface (EMI)
- A variety of Call Detail Records (CDRs), including Toly Digital, Level 3 GTO, Powernet, XCast Labs, TNCI, Zone Telecom, Spirit Telecom, Telehop, Bell Canada, Dialog, and DMS-MTX.
- Transcend Daily Call Detail (Verizon)
- Standard Daily Extract (CenturyLink)
- Lucent Flexent/AUTOPLEX Executive Call Processor
- Comma-delimited (.csv) transaction files for VoIP
- Comma-delimited (.csv) transaction files for VOD

Process Scheduling Processing automation for each Mediation function ranges from full intervention mode (manually starting processes) to full automation mode (processes that start when thresholds or other specific criteria are met). The system scheduling manager provides easy access to all processing needs.

Fraud Detection and Monitoring Create and manage factors used to evaluate and determine when fraud alerts are triggered. Define rules around call numbers, call type, usage type, and other factors. Exclusions can also be set up for all fraud rules, or specific rule IDs. View logs that are created for each fraud event.

FEATURES (CONTINUED)

File Tracking Audit IDs are assigned to every file for tracking records in the system.

Reporting and Studies

- Trending reports highlight and identify anomalies.
- Audit reports verify that transactions are accountable.
- Warning reports identify any issues associated with the transaction being processed.
- Comma-delimited (.csv) files can be generated to be used internally or sent to consultants and can import data into applications such as MS Excel to generate additional specialized reporting.

ANALYSIS TOOLS

- **AMA Search**
 - Filter based on a single criterion or combinations of preset AMA fields.
 - Multiple optional report presentation options.
 - Details of individual records and overall totals.
- **EMI Search**
 - Filter based on single or combinations of preset EMI fields.
 - Filter based on positional parameter with user criteria.
 - Results presented on three optional report presentations.
 - Results placed in two EMI industry file formats or CDG internal formats.
 - Details of individual records and overall totals.
- **Usage Search**
 - Create custom profiles to search master or work files for messages and charge records (**Fig. 2**).
- **Custom Queries and Dashboards**
 - Create custom queries and dashboards for reporting and auditing through our Reporting element

RATE CALCULATIONS

Mediation offers stand-alone integrated standard rating for non-tiered/non-bulk plans, or advanced rating options when combined with the other services on the Elements platform.

Rate Packages (control pricing of daily usage transactions)

- Pass through usage with predetermined price.
- Use alternate charge (modules, etc.).
- Utilize rate plan code to determine rate.

Rate Plans

- Based on location and/or specific dates
- Rate banding by distance, locations, etc.
- Rate period differentiation
- Holiday rating
- Units vs. transaction rating
- Initial and overtime rating units
- Application of surcharges

Processing Priority

Ensures that appropriate rates are applied consistently and accurately when multiple rate packages, allowances, and discounts/miscellaneous charges are applicable.

Rate Packages (Available with integrated element)

Utilize any combination of rate plans, allowances, and discount and miscellaneous charges.

Discounts and Miscellaneous Charges

- Can be based on selection criteria for usage (type, subtype, method, rules, etc.).
- Can be based on selection criteria for non-usage (type, item type, item sub-type, etc.).
- Selected items can be used as qualifying or eligible items, and can be limited to debits, credits, or both.
- Step and volume tier structures are supported.
- Percentage rating, flat rating (charges only).

Allowances

- Can exclude pre-defined amounts of usage (minutes/transactions) from normal pricing.
- Can define an override rate applicable to usage within specific rate period(s).
- Can be based on usage selection criteria (type, sub-type, method, rules, etc.).
- Can be applied on a per transaction basis.
- Can be based on dynamic quantity (incrementing allowance based on specific transactions).
- Includes a pooling option (a sharing of allowance among services).
- Includes a pre-pooling option (a chronological application of the pooled allowance).
- Proration, charge quantity and inheritance functions.
- Use qualifying items to assess a minimum charge.