



SpryPoint

SMART SOLUTIONS FOR SMART UTILITIES

SpryEngage - Cogsdale Integration Business Requirements Document

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Statement of Confidentiality

The contents of this report are confidential and are supplied on the understanding that they will be held confidentially and not disclosed to third parties without the prior written consent of SpryPoint.

Integration Details

Description from Statement of Work

This document outlines the functional requirements for the seamless integration between SpryEngage (Customer Portal System) and Cogsdale CSM (Customer Service Management system). The core objective of this integration is to establish a near real-time communication link, ensuring swift and accurate synchronization of vital data elements from Cogsdale to SpryEngage. It focuses on the synchronization of critical datasets such as Customer Information, Location Details, Account Specifics, Metering Information, Service Records, Consumption Data, and Email Correspondence, ensuring that both systems are aligned with updated and cohesive information.

Background and Business Value

The integration between SpryEngage and Cogsdale CSM ensures seamless data flow and accessibility of critical customer data. By enabling synchronization every five minutes, this integration empowers SpryEngage with up-to-date information regarding customer accounts, locations, metering details, service records, consumption data, and email correspondence.

This facilitates robust customer service and engagement by providing CSRs with immediate access to pertinent customer information, improving response times, and enhancing the overall customer experience.

Business Requirements

1. Customer Information Sync

- SpryEngage will retrieve essential customer information from Cogsdale CSM to maintain updated and comprehensive customer profiles.

Customer Data Retrieved:

- **Customer ID:** A unique identifier associated with each customer record within Cogsdale CSM.
 - **First and Last Name / Company Name:** Essential personal or corporate identification details of the customer.
 - **Place of Work:** Information specifying the customer's workplace or affiliation.
 - **Phone Numbers:** Registered customer phone numbers.
 - **Email Address:** The registered email address of the customer within the Cogsdale CSM system.
 - **Customer Type (or Class ID):** Classification or categorization assigned to customers within Cogsdale CSM, providing specific groupings or classifications.
- Ensure synchronization occurs at five-minute intervals to maintain updated and accurate customer information.

2. Location Information Sync

- SpryEngage will retrieve essential location details from Cogsdale CSM to maintain an updated repository of location-based information.

Location Information Retrieved:

- **Location ID:** Retrieve a unique identifier for each location record in Cogsdale CSM.
- **Service Address:** Acquire the service address associated with each location record.
- **Service Type:** Receive information about the service type and its corresponding start and end dates.
- **Service Type Status:** Capture the status indicating whether the service type is active or inactive.

- **Premise Type (Location Class):** Obtain information about the premise type or location class for categorization purposes.
- **Geographical Coordinates:** Receive information about the geographical coordinates for mapping purposes.

3. Account Information Sync

- SpryEngage will retrieve essential account-related data from Cogsdale CSM to maintain an updated and comprehensive repository of account information.

Account Information Retrieved:

- **Customer Number:** Retrieve the unique identification number associated with each customer..
- **Account Dates:** Obtain the account's start and end dates, delineating the period of account existence. This will show the record of the customer's start and end date at each location.
- **Account Status:** Capture the account status to indicate whether it's active or inactive.
- **Statement History:** Retrieve statement amounts and their corresponding due dates linked with the respective accounts.
- **Payment History:** Capture the history of payments made on the customer's account.
- **Current Balance:** Obtain the current outstanding balance on the account.
- **Total and Past Due Amount:** Retrieve the total amount due and any past due amounts associated with the account.

4. Metering Information Sync

- SpryEngage will retrieve essential meter-related data from Cogsdale CSM to effectively manage and display basic meter information.

Metering Information Retrieved:

- **Meter Identification:** Retrieve the unique identification number associated with each meter.
- **Manufacturer:** Obtain details regarding the manufacturer of the meter.

- **Phases:** Capture information regarding the phases the meter supports or functions with.
- **Dial Count:** Retrieve the count or number of dials associated with the meter.
- **Smart Meter Flag:** Capture whether the meter is a smart meter or not, based on the information available from Cogsdale CSM.
- **Transponder ID:** Obtain the unique identification number associated with the transponder linked to the meter.
- **Installation and Removal Dates:** Capture the dates when the meter was installed and, if applicable, when it was removed or replaced.
- **Meter Status:** Retrieve the current status of the meter, indicating whether it's installed or uninstalled.

5. Service Record Sync

- SpryEngage will retrieve service record information from Cogsdale CSM to provide comprehensive service details.

Service Record Information Retrieved:

- **Location Number:** Retrieve the unique identification number associated with the location or premise where the service is provided.
- **First Connected Date:** Capture the date when the service was initially connected or activated.
- **Last Disconnect Date:** If applicable, capture the date when the service was disconnected or terminated.
- **Service Type:** Obtain details regarding the type or nature of the service provided to the location.
- **Connection Sequence:** Capture the sequence or order in which the service was connected among multiple services at the location.

6. Consumption Information Sync

- SpryEngage will retrieve meter consumption data from Cogsdale CSM to track and display consumption-related details accurately.

Consumption Information Retrieved:

- **Reading Date:** Retrieve the date on which the meter reading was taken, indicating the specific time of consumption measurement.

- **Consumption and Consumption Multiplier:** Capture the total consumption value and its multiplier to accurately represent the consumption volume.
- **Reading:** Obtain the actual meter reading value recorded during the specified reading date.

7. Email Sync

- SpryEngage is required to seamlessly synchronize email correspondence between Cogsdale CSM and its platform, ensuring comprehensive storage, contact updates, and synchronization of new email addresses for efficient access and management.

Details:

- **Email Retrieval and Storage:** SpryEngage will retrieve all emails from Cogsdale CSM and securely store them within its system for future reference and efficient management.
- **Contact Database Management:** Based on the received email information, SpryEngage will update existing Customer contacts with any new data and create additional contacts for newly received email addresses. This practice ensures the maintenance of an accurate and up-to-date database of contacts associated with received emails.
- **Synchronization of New Email Addresses:** When new email addresses are created within SpryEngage, the new email data is synchronized and sent back to Cogsdale CSM. This process aims to maintain consistency and comprehensive data records across both platforms.

8. Phone Number Two-Way Sync

- SpryEngage must facilitate a seamless two-way synchronization of phone numbers between Cogsdale CSM and its platform, enabling customers to edit existing numbers and add new ones. The synchronization should ensure the accurate exchange of phone number data while maintaining consistency and preventing inadvertent overwrites.

Details:

- **Edit Existing Phone Numbers:** Customers using SpryEngage can edit phone numbers already present in Cogsdale CSM. Any changes made in SpryEngage will be sent to CSM to ensure synchronization of updated information.
- **Addition of New Phone Numbers:** Customers can add new phone numbers in SpryEngage, and if these new numbers are later added in Cogsdale CSM, they become eligible for editing within SpryEngage. However, if a phone number does not already exist in CSM, any edits or additions of new numbers within SpryEngage will be overwritten in the Cogsdale - Engage sync cycle, which occurs every five minutes.

Dependencies

The access, readiness, and stability of the Cogsdale CSM platform are crucial for seamless data reception and processing. Collaboration between the SpryEngage development team and Cartersville is essential to access the Cogsdale system environment. This collaboration aims to analyze, map, and retrieve data from the Cogsdale system. Any technical issues or system downtime on the CSM side could hinder the synchronization process and data flow.

The integration's effectiveness relies heavily on the consistency and accuracy of data stored in both SpryEngage and Cogsdale CSM. Ensuring uniformity and correctness of data across both platforms is paramount. Discrepancies, inconsistencies, or data quality issues may cause synchronization errors and misinterpretation of information.

Assumptions

It is assumed that paperless billing subscriptions are actively maintained within Invoice Cloud, and the generation of paperless billing notifications is conducted from the Invoice Cloud platform. SpryEngage will support paperless bill subscriptions via Invoice Cloud iframe integration. To avoid redundancy, paperless billing notifications will be disabled in SpryEngage.

The credit card autopay functionalities are appropriately configured and operational within Invoice Cloud. This integration will facilitate customers' ability to set up and manage recurring payments seamlessly.

Gap Analysis

This section highlights what SpryEngage currently lacks to meet new project requirements. It identifies specific missing features and outlines the needed actions for meeting the requirements.

1. Account Information Retrieved - Total and Past Due Amount

The requirement entails the retrieval of both the total amount due and any outstanding past due amounts associated with customer accounts.

Gap

The default SpryEngage-Cogsdale procedure retrieves and displays only the account total amount due. It lacks the functionality to specifically extract and exhibit information pertaining to past due amounts associated with customer accounts

Action Required

To meet this requirement, SpryEngage requires enhancements to its functionality to retrieve and display past due amounts. Development efforts are necessary to modify the data retrieval mechanism, allowing SpryEngage to access and present both the total and past due amounts for customer accounts retrieved from Cogsdale.

2. Active Autopay ACH Subscriptions

Initially, SpryEngage was anticipated to exclusively engage with Invoice Cloud's credit card autopay feature, based on the assumptions outlined in the SOW. However, there's a recognition that some existing customers have active

ACH/NACHA-based Autopay subscriptions stored within Cogsdale. This requirement aims to confirm SpryEngage's need to access and display information regarding active ACH-based autopay subscriptions stored in Cogsdale. For new Autopay subscriptions, only the Invoice Cloud autopay feature supporting Credit Card payments should be presented.

Gap

SpryEngage currently possesses the functionality required to support this feature, albeit necessitating proper system configuration and sync procedures to align with the desired behavior.

Action Required

Proper system configuration and sync procedures are required to ensure SpryEngage aligns with the expected behavior for displaying and managing active ACH-based autopay subscriptions, while allowing new subscriptions to go to the Invoice Cloud autopay feature.

3. Synchronization of New Email Addresses

The requirement entails the synchronization of newly created email addresses from SpryEngage to Cogsdale CSM. This process aims to maintain unified and comprehensive data records between the platforms.

Gap

Currently, SpryEngage lacks the functionality to synchronize new email addresses back to Cogsdale CSM. The absence of this synchronization is due to potential concerns related to data reconciliation and overwriting issues.

Action Required

Should this synchronization be deemed necessary, collaborative efforts with the Cartersville team are imperative. The aim is to define and outline a synchronization process that ensures seamless data transmission without compromising data integrity or encountering reconciliation challenges. This process should carefully avoid data overwriting issues while establishing a robust data synchronization pathway between SpryEngage and Cogsdale CSM.

4. Electric Readings

SpryEngage's Meter Usage Profile graph currently displays the account energy consumed (kWh) using a single unit of measurement (UOM) across all customers. However, it lacks the ability to showcase critical power-related data such as instantaneous power (kW), Kilovolt-Ampere Reactive (kVAR), and net metering specifics like delivered and received energy, which are stored in SpryIDM.

Gap

The existing Meter Usage Profile graph in SpryEngage falls short in graphing and exhibiting essential power-related metrics available in SpryIDM, creating a limitation in presenting comprehensive energy consumption data to users.

Action Required

Dedicated development work is needed to expand SpryEngage's graphing capabilities to include additional power data such as instantaneous power, kVAR, and net metering metrics.

5. Gas Readings

SpryIDM manages and stores gas consumption data, encompassing volume measurements like Thousands/Hundreds of Cubic Feet (MCF/CCF) representing total gas consumption per interval. Cartersville is expecting that for some customers the usage data is presented in MCF, while for some others data is shown as CCF.

Gap

The current representation of Meter Usage data in SpryEngage uses a single unit of measurement (UOM) for all customers, lacking the flexibility to display varied units based on meter specifications or customer types. This limitation restricts the platform's ability to accommodate differing volume measurements for commercial and residential customers as per their respective gas usage units.

Action Required

Implementing the ability to display Gas Consumption data in multiple units on a customer basis, requires specific development work within SpryEngage's Meter Usage and Consumption Profile data presentation.

Out of Scope

#	Item
1	Additional functionalities beyond the specified data attributes.

Outstanding Decisions & Questions

#	Question
1	

Project Impacts

Testing

Scenarios to test:

1. Data Synchronization Testing

Verify the synchronization frequency by initiating changes in Cogsdale CSM and assessing how quickly SpryEngage reflects these modifications.

2. Data Consistency and Accuracy Testing

Verify that all customer data elements that have been consumed by the SpryEngage application as they appear in Cogsdale. While not limited to these data elements, it will be important to verify billed consumption amounts as well as the historic customer - location data.

3. Functional Integration Testing

Perform end-to-end testing of functionalities (e.g., Customer Information Sync, Account Information Sync) and validate their execution between SpryEngage and Cogsdale CSM.

4. Email Sync Testing

Send emails from Cogsdale CSM to SpryEngage and verify their synchronization and accurate storage within SpryEngage.

5. Phone Number Two-Way Sync Testing

Edit phone numbers in SpryEngage and Cogsdale CSM and confirm that changes sync both ways without inconsistencies.

Document Approval

The City of Cartersville has had the opportunity to review this report and at this time finds no issue with the content.

City of Cartersville Approved by:

Signature of Authorized Representative of
the City of Cartersville

Name (print):

Date: _____

SpryPoint Accepted by:

Name (print):

Date: _____