SAGE PAYMENT SOLUTIONS

GATEWAY

XMLBankcardWebServices

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sage

Overview - XML Web Services

The Gateway is an ecommerce platform that provides a wide variety of ecommerce functionality. At a systems level, the gateway offers bankcard and virtual check processing.

In the area of bankcard processing, the Gateway supports ecommerce and retail certifications supporting AVS, CVV/CVV2, etc. In addition, several advanced options for managing fraud/risk are available for AVS and CVV.

For virtual check processing, the Gateway supports Prearranged Payment and Deposits (PPD), Cash Concentration or Disbursement (CCD), Accounts Receivable Collection (ARC), Telephone Initiated Entries (TEL), Returned/Dishonored Check (RCK), and Internet (WEB) transaction classes as defined by the National Automated Clearing House Association (NACHA).

For presentation, the primary interface for the Gateway is the Virtual Terminal. The Virtual Terminal provides a wide variety of functionality for the merchant including:

- Manual Bankcard Processing

- Manual Virtual Check Processing

- Recurring Transactions

- Batch Management

- Integrated Shopping Cart Configuration

- Reporting

- Advanced Configuration and User Management

Essentially, transactions are processed from a wide variety of sources, including API, XML Web Services, manual transactions from within the Virtual Terminal, recurring transactions scheduled within the Virtual Terminal, and consumer initiated transactions via the Virtual Terminal Shopping Cart.

All of these transactions are provided in the merchant's current batch and may be reviewed, batched, etc. via the Virtual Terminal.

Integration with XML Web Services

Since its initial release in 1998, the Gateway has offered an HTTPS public specification for interacting with the Gateway. This specification for both authorizations and response messages has gone through several revisions since inception.

In Fall 2002, XML Web Services were released which simplify the integration process for a variety of Gateway functionality. Specifically, XML Web Services address the following key areas:

- Transaction Processing for Bankcard and Virtual Check

- Batch Management for Bankcard and Virtual Check

- Reporting

The XML Web Services are accessed via a Secure Sockets Layer (SSL) interface and require a unique M_id (Gateway Merchant ID) and M_key (Gateway Merchant Key) pair for accessing the services.

Bankcard Transaction Processing

The Transaction Processing web service wraps the public specification for HTTPS post transactions as well as adding additional functionality not available from other implementation methods.

The formal WSDL service description for the Transaction Processing Service is located at:

https://gateway.sagepayments.net/web_services/wsvtextensions/transaction_processing.asmx?WSDL

Bankcard Related Methods:

- BANKCARD_SALE - performs a new SALE transaction.

- BANKCARD_AUTHONLY - performs a new AUTHONLY transaction.

- BANKCARD_PRIOR_AUTH_SALE - converts and existing AUTHONLY from the current batch to a PRIOR AUTH SALE transaction

- BANKCARD_FORCE - performs a new FORCE transaction.

- BANKCARD_CREDIT - performs a new CREDIT transaction on a pre-existing settled transaction

- BANKCARD_VOID - removes an existing transaction from the current batch.

For a list of TRANSACTION_PROCESSING operations go to:
https://gateway.sagepayments.net/web_services/wsvtextensions/transaction_processing.asmx

For testing click go to:
https://gateway.sagepayments.net/web_services/vterm_extensions/transaction_processing.asmx

- BANKCARD_SALE (For testing click HERE)
- BANKCARD_AUTHONLY (For testing click HERE)
- BANKCARD_CREDIT_OR_REFUND (For testing click HERE)

Field Data Element	Required	Field Description	Parameters	Format and Examples
M_ID	Required	12 Digit Merchant Identification (Virtual Terminal ID) Number Required for Gateway Access	Numeric: 12 digits	999999999997
M_KEY	Required	12 Digit Merchant Key Required for Gateway Access	A/N: 12 Digits Letter number letter number format; case sensitive	A1B2C3D4E5F6
C_NAME	Required	This field contains the customer's name for the transaction being processed.	Alpha: 50 character limit	John Doe
C_ADDRESS	Required	This field contains the customer's address for the transaction being processed. The Address is used in address verification requested transactions.	A/N: 50 Character limit	123 Main St.
C_CITY	Required	This field contains the customer's city for the transaction being processed.	A/N: 50 Character limit	Juneau
C_STATE	Required	This field contains the customer's state for the transaction being processed and can be either an abbreviation or the full name	Alpha: 50 character limit	AK
C_ZIP	Required	This field contains the customer's zip/postal code for the transaction being processed. The zip/postal Code is used in address verification requested transactions.	Domestic: 5 or 9 Digit International: 50 A/N Limit minimum 3 characters	12345

C_COUNTRY	Optional	This field contains the customer's billing country code or description for the transaction being processed, if not provided US is assumed	A/N: 50 Character limit	United States, US, 840
C_EMAIL	Required	This field contains the customer's email address for the transaction being processed. If the email address is provided and the merchant has the email setting enabled inside the virtual terminal the customer will receive an email order confirmation with transaction details.	A/N: 50 Character limit with an @ symbol	test@test.com
C_CARDNUMBER	Required	This field contains the card number for the transaction being processed. The card number should contain numbers only with no spaces or dashes	Numeric: 13-22 Digits	4111111111111111
C_EXP	Required	This field contains the 4 digit card expiration date for the transaction being processed. The expiration date should be in the format MMYY.	Numeric: 4 Digits	mmyy
C_CVV	Optional	This field contains the card verification value printed on the front or back of the customer's card for the transaction being processed. The card verification value assists in authenticating the physical presence of a card.	Numeric: 3-4 Digits	123, 1234
T_CUSTOMER_NUMBER	Optional	This field contains the 17 character reference id number supplied by the Purchase Card cardholder for the transaction being processed.	Numeric: 1-17 Characters	123456

		Transactions		
T_AMT	Required	This field contains the total amount for the transaction being processed. The total amount should contain numbers only except in the case where the amount is not a whole number in which case a decimal point should be used.	Numeric: 1-6 Characters (not including the .00)	999999.00; 999999.0; 999999; 999999.20; 999999.2
T_SHIPPING	Optional	This field contains the shipping amount for the transaction being processed. The shipping amount should contain numbers only except in the case where the amount is not a whole number in which case a decimal point should be used.	Numeric: 1-6 Characters (not including the .00)	999999.00; 999999.0; 999999; 999999.20; 999999.2
T_TAX	Optional	This field contains the tax amount for the transaction being processed. The tax amount should contain numbers only except in the case where the amount is not a whole number in which case a decimal point should be used.	Numeric: 1-6 Characters (not including the .00)	999999.00; 999999.0; 999999; 999999.20; 999999.2
T_ORDERNUM	Optional	This field contains the order number for the transaction being processed. The order number can be any alpha-numeric value, less than 50 in length, the merchant requires for transaction records. If an order number is not provided the system will generate a unique order number and assign it to the transaction. The order number is returned in the response generated by the host.	A/N: 1-50 Character limit	12345

C_TELEPHONE	Optional	This field contains the customer's telephone number for the transaction being processed.	Numeric: 50 digit Limit	123456789; 123-456-7890; 123.456.7890
C_FAX	Optional	This field contains the customer's fax number for the transaction being processed.	Numeric: 50 digit Limit	123456789; 123-456-7890; 123.456.7890
C_SHIP_NAME	Optional	This field contains the recipient's name for the transaction being processed. Recipient data is used for transaction records where a shipping address was supplied.	A/N: 50 Character limit	John Doe
C_SHIP_ADDRESS	Optional	This field contains the recipient's address for the transaction being processed. Recipient data is used for transaction records where a shipping address was supplied.	A/N: 50 Character limit	123 Main St.
C_SHIP_CITY	Optional	This field contains the recipient's city for the transaction being processed. Recipient data is used for transaction records where a shipping address was supplied.	A/N: 50 Character limit	Juneau
C_SHIP_STATE	Optional	This field contains the recipient's state for the transaction being processed and can be either an abbreviation or the full name. Recipient data is used for transaction records where a shipping address was supplied.	A/N: 50 Character limit	AK
C_SHIP_ZIP	Optional	This field contains the recipient's zip code for the transaction being processed. Recipient data is used for transaction records where a shipping	Domestic: 5 or 9 Digit International: 50 A/N Limit minimum 3	12345

		address was supplied.	characters	
C_SHIP_COUNTRY	Optional	This field contains the recipient's country code or description for the transaction being processed, if not provided US is assumed.	A/N: 50 Character limit	United States, US, 840
T_APPLICATION_ID	Optional in Test Mode. Required when in Production Mode.	The developer Application ID will be assigned by Sage. You will need to fill out an Application ID Request Form.	A/N: 27 Characters	SAGETEST1 000000DEM OAAS9USEN
T_DEVICE_ID	Optional	The device serial number / id.	A/N: 7 or more Characters.	B02A41H

- BANKCARD_FORCE (For testing click HERE)

Field Data Element	Required	Field Description	Parameters	Format and Examples
M_ID	Required	12 Digit Merchant Identification (Virtual Terminal ID) Number Required for Gateway Access	Numeric: 12 digits	999999999997
M_KEY	Required	12 Digit Merchant Key Required for Gateway Access	A/N: 12 Digits Letter number letter number format; case sensitive	A1B2C3D4E5F6
C_NAME	Required	This field contains the customer's name for the transaction being processed.	Alpha: 50 character limit	John Doe
C_ADDRESS	Required	This field contains the customer's address for the transaction being processed. The Address is used in address verification requested transactions.	A/N: 50 Character limit	123 Main St.
C_CITY	Required	This field contains the customer's city for the transaction being processed.	A/N: 50 Character limit	Juneau
C_STATE	Required	This field contains the customer's state for the transaction being processed and can be either an abbreviation or the full name	Alpha: 50 character limit	AK
C_ZIP	Required	This field contains the customer's zip/postal code for the transaction being processed. The zip/postal code is used in address verification requested	Domestic: 5 or 9 Digit International: 50 A/N Limit minimum 3	12345

		transactions.	characters	
C_COUNTRY	Optional	This field contains the customer's billing country code or description for the transaction being processed, if not provided US is assumed	A/N: 50 Character limit	United States, US, 840
C_EMAIL	Required	This field contains the customer's email address for the transaction being processed. If the email address is provided and the merchant has the email setting enabled inside the virtual terminal the customer will receive an email order confirmation with transaction details.	A/N: 50 Character limit with an @ symbol	test@test.com
C_CARDNUMBER	Required	This field contains the card number for the transaction being processed. The card number should contain numbers only with no spaces or dashes	Numeric: 13-22 digits	4111111111111111
C_EXP	Required	This field contains the 4 digit card expiration date for the transaction being processed. The expiration date should be in the format MMYY.	Numeric: 4 digits	mmyy
C_CVV	Optional	This field contains the card verification value printed on the front or back of the customer's card for the transaction being processed. The card verification value assists in authenticating the physical presence of a card.	Numeric: 3-4 digits	123, 1234
T_CUSTOMER_NUMBER	Optional	This field contains the 17 character reference id	Numeric: 1-17	123456

		number supplied by the Purchase Card cardholder for the transaction being processed. Transactions	Characters	
T_AMT	Required	This field contains the total amount for the transaction being processed. The total amount should contain numbers only except in the case where the amount is not a whole number in which case a decimal point should be used.	Numeric: 1-6 Characters (not including the *.00*)	999999.00; 999999.0; 999999; 999999.20; 999999.2
T_SHIPPING	Optional	This field contains the shipping amount for the transaction being processed. The shipping amount should contain numbers only except in the case where the amount is not a whole number in which case a decimal point should be used.	Numeric: 1-6 Characters (not including the *.00*)	999999.00; 999999.0; 999999; 999999.20; 999999.2
T_TAX	Optional	This field contains the tax amount for the transaction being processed. The tax amount should contain numbers only except in the case where the amount is not a whole number in which case a decimal point should be used.	Numeric: 1-6 Characters (not including the *.00*)	999999.00; 999999.0; 999999; 999999.20; 999999.2
T_AUTH	Required	This field contains the 6 digit authorization code previously received in a transaction response or voice authorization. *Previous Authorization Code required for BANKCARD_PRIOR_AU	A/N: Maximum 6 characters	123456; 12345A

		TH_SALE and BANKCARD_FORCE XML Services		
T_ORDERNUM	Optional	This field contains the order number for the transaction being processed. The order number can be any alpha-numeric value, less than 50 in length, the merchant requires for transaction records. If an order number is not provided the system will generate a unique order number and assign it to the transaction. The order number is returned in the response generated by the host.	A/N: 1-50 Character limit	12345
C_TELEPHONE	Optional	This field contains the customer's telephone number for the transaction being processed.	Numeric: 50 digit Limit	123456789; 123-456-7890; 123.456.7890
C_FAX	Optional	This field contains the customer's fax number for the transaction being processed.	Numeric: 50 digit Limit	123456789; 123-456-7890; 123.456.7890
C_SHIP_NAME	Optional	This field contains the recipient's name for the transaction being processed. Recipient data is used for transaction records where a shipping address was supplied.	A/N: 50 Character limit	John Doe
C_SHIP_ADDRESS	Optional	This field contains the recipient's address for the transaction being processed. Recipient data is used for transaction records where a shipping address was supplied.	A/N: 50 Character limit	123 Main St.

C_SHIP_CITY	Optional	This field contains the recipient's city for the transaction being processed. Recipient data is used for transaction records where a shipping address was supplied.	A/N: 50 Character limit	Juneau
C_SHIP_STATE	Optional	This field contains the recipient's state for the transaction being processed and can be either an abbreviation or the full name. Recipient data is used for transaction records where a shipping address was supplied.	A/N: 50 Character limit	AK
C_SHIP_ZIP	Optional	This field contains the recipient's zip code for the transaction being processed. Recipient data is used for transaction records where a shipping address was supplied.	Domestic: 5 or 9 Digit International: 50 A/N Limit minimum 3 characters	12345
C_SHIP_COUNTRY	Optional	This field contains the recipient's country code or description for the transaction being processed, if not provided US is assumed.	A/N: 50 Character limit	United States, US, 840

- BANKCARD_PRIOR_AUTH_SALE (For testing click HERE)

Field Data Element	Required	Field Description	Parameters	Format and Examples
M_ID	Required	12 Digit Merchant Identification (Virtual Terminal ID) Number Required for Gateway Access	Numeric: 12 digits	999999999997
M_KEY	Required	12 Digit Merchant Key Required for Gateway Access	A/N: 12 Digits Letter number letter number format; case sensitive	A1B2C3D4E5F6
T_AMT	Required	This field contains the total amount for the transaction being processed. The total amount should contain numbers only except in the case where the amount is not a whole number in which case a decimal point should be used.	Numeric: 1-6 Characters (not including the *.00*)	999999.00; 999999.0; 999999; 999999.20; 999999.2
T_SHIPPING	Optional	This field contains the shipping amount for the transaction being processed. The shipping amount should contain numbers only except in the case where the amount is not a whole number in which case a decimal point should be used.	Numeric: 1-6 Characters (not including the *.00*)	999999.00; 999999.0; 999999; 999999.20; 999999.2
T_TAX	Optional	This field contains the tax amount for the transaction being processed. The tax amount should contain numbers only except in the case where the amount is not a whole number in which case a decimal point should be used.	Numeric: 1-6 Characters (not including the *.00*)	999999.00; 999999.0; 999999; 999999.20; 999999.2
T_AUTH	Required	This field contains the 6 digit authorization code previously received in a transaction response or voice authorization. *Previous Authorization Code required for BANKCARD_PRIOR_AUTH_SALE and BANKCARD_FORCE XML Services	A/N: Maximum 6 characters	123456; 12345A
T_REFERENCE	Required	This field contains the 10 character unique transaction reference assigned	A/N: 10 *Maximum	CA3CGoHRP0

| | | to a transaction run on the system. The Transaction Reference is used in Void, Credit, and Prior Auth transactions where the original transaction data is no longer known to the merchant.

This 10 character field contains the unique reference assigned to the transaction. The Transaction Reference can be used later to capture Authorization Only transactions, Void transactions in the current open batch, Credit a transaction run previously on the system. | Characters | |

- BANKCARD_CREDIT (For testing click HERE)

Field Data Element	Required	Field Description	Parameters	Format and Examples
M_ID	Required	12 Digit Merchant Identification (Virtual Terminal ID) Number Required for Gateway Access	Numeric: 12 digits	999999999997
M_KEY	Required	12 Digit Merchant Key Required for Gateway Access	A/N: 12 Digits Letter number letter number format; case sensitive	A1B2C3D4E5F6
T_AMT	Required	This field contains the total amount for the transaction being processed. The total amount should contain numbers only except in the case where the amount is not a whole number in which case a decimal point should be used.	Numeric: 1-6 Characters (not including the .00)	999999.00; 999999.0; 999999; 999999.20; 999999.2
T_REFERENCE	Required	This field contains the 10 character unique transaction reference assigned to a transaction run on the system. The Transaction Reference is used in Void, Credit, and Prior Auth transactions where the original transaction data is no longer known to the merchant. *This 10 character field contains the unique reference assigned to the transaction. The Transaction Reference can be used later to capture Authorization Only transactions, Void transactions in the current open batch, Credit a transaction run previously on the system.	A/N: 10 *Maximum Characters	CA3CGoHRP0

- BANKCARD_VOID (For testing click HERE)

Field Data Element	Required	Field Description	Parameters	Format and Examples
M_ID	Required	12 Digit Merchant Identification (Virtual Terminal ID) Number Required for Gateway Access	Numeric: 12 digits	999999999997
M_KEY	Required	12 Digit Merchant Key Required for Gateway Access	A/N: 12 Digits Letter number letter number format; case sensitive	A1B2C3D4E5F6
T_REFERENCE	Required	This field contains the 10 character unique transaction reference assigned to a transaction run on the system. The Transaction Reference is used in Void, Credit, and Prior Auth transactions where the original transaction data is no longer known to the merchant. *This 10 character field contains the unique reference assigned to the transaction. The Transaction Reference can be used later to capture Authorization Only transactions, Void transactions in the current open batch, Credit a transaction run previously on the system.*	A/N: 10 *Maximum Characters	CA3CGoHRP0

The required data elements and fields for each method vary from method to method but are based on the HTTPS Documentation (See HTTPS Bankcard Documentation)

All Transaction Processing Methods will return an XML document. The document will contain 1 record with fields defined as follows:

Approval Indicator	• A = Approved • E=Front-End Error/Non Approved • X = Gateway Error/Non Approved
Code	Approval or Error Code
Message	Approval or Error Message