



Tokenisation Merchant guide

1. About tokenisation

Tokenisation is the process of substituting a sensitive data element with a non-sensitive equivalent, referred to as a token. Tokens are identifiers, consisting of random digits that can be mapped back to sensitive data through a tokenisation system.

Tokenisation is carried out in a few payment sequences. The initial payment, the creation of the token and the subsequent payment when the said token is used.

Token creation sequence:

When the initial (first) payment is made, the end-user will enter their card details. These include the PAN, cardholder name, expiry and CVV. This sensitive data (except for the CVV) is saved in a special token vault database and a random irreversible token is assigned to it.

Token example: 5e273496-4c7f-40de-bc83-ee0ae3883f16

Token usage sequence:

In subsequent payments, the merchant and the payment gateway can use the token instead of the sensitive card data to make a payment. Once a card has been used (i.e. tokenised) on a website, the returning customer can select the previously used card and enter only the CVV value to confirm the payment. This shortens the steps taken by the customer when making a payment.

2. What are the benefits?

Tokenisation enables you to offer your customers the ability to pay with a previously saved card. Benefits include:

- · Reduced PCI compliance burden
- · Secure online payment processing
- Improved customer journey and reduced dropoff rates
- Save as many cards as preferred for a single user

3. Activation

Your emerchantpay account manager will be able to assist you with activating tokenisation.

If you currently store tokens, please see section 5 for more information about importing tokens.

4. Integration options

Tokenisation is available through all the integration options offered: direct 'server to server' integration, the hosted payment page and tokenisation at source (CSE).

- Server-to-server (direct) integration is suitable if you collect and / or store the cardholder data before transmitting them to our systems for processing
- Hosted payment page integration is suitable if you do not collect and / or store the cardholder data before
 transmitting them to our systems for processing. This is a secured web payment form, hosted on the emerchantpay
 server
- Tokenisation at source (CSE) please see the tokenisation at source guide for more information



4.1. Tokenisation process flow – direct, 'server to server' integration

To help you assess which integration fits your requirements, we've outlined below the tokenisation process flow for each.

A new customer performs a transaction on your website:

- 1. An API call is required to process the payment along with setting an additional parameter, indicating that the customer card details are to be saved
- 2. The payment is processed using the customer original data. The card details are saved in the emerchantpay token vault; a new token is issued and returned to you along with the payment transaction response

An existing customer who has already performed a transaction and created a token wishes to perform a subsequent transaction:

- A list of the stored cards are displayed
- 2. The customer selects a card and is asked to enter the CVV
- 3. The saved token is used to process the payment as part of the API call

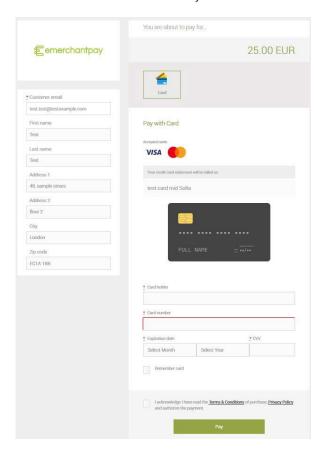
Note: when the customer pays for the first time, the emerchantpay gateway assigns a consumer_id to the customer. The consumer_id should be saved and used together with the token in subsequent payment API calls.

4.2. Tokenisation process flow - hosted payment page integration

The emerchantpay secure Web Payment Form (WPF) has built-in functionality to save and tokenise customer card details. Once the customer completes their initial transaction and their card details are tokenised, the customer will be able to select the previously used card for subsequent transactions.

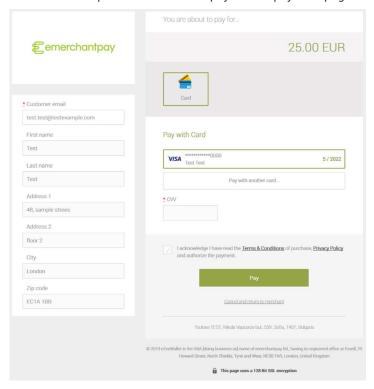
A list of the saved cards, where applicable, will be displayed for the consumer to select which one they would prefer to use on each subsequent transaction. There is also an option for the end customer to enter new card details.

Here is an example of the emerchantpay hosted payment page. This is what the customer will see if they are using the website for the first time or if they have not selected to store a card.





Here is an example of the emerchantpay hosted payment page when the consumer chose to store a previously used card.

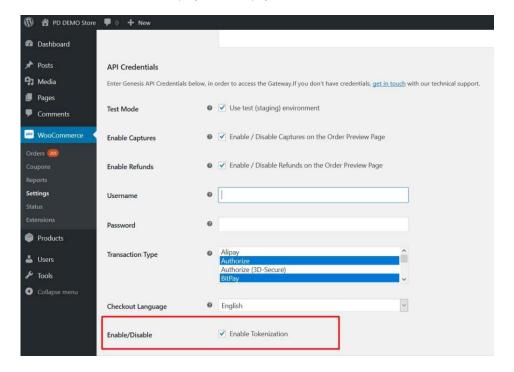


4.3. Tokenisation process flow - supported shopping cart plug-ins

We've integrated our global payments capability with leading retail shopping cart solutions, designed to save you development time and cost. For a full list of our shopping cart plugins, please visit our website:

https://www.emerchantpay.com/shopping-carts/

If you are using some of the emerchantpay shopping cart plug-ins, the tokenisation functionality can be enabled with a single checkbox as per the image below. This example is specific to the WooCommerce plugin. A "Remember card" button and a list of saved cards will be displayed in the payment form.





5. Importing tokens

Please contact your account manager for more information on how to import tokens and make use of them.

Steps required by your provider:

- 1. Token information is required in CSV file format. Please see the below mentioned API link for further information on the required / optional fields
- 2. The file(s) must be encrypted and a public GPG key should be used for this purpose
- 3. Once encrypted, the file(s) must be uploaded onto our remote SFTP server

Once the tokens are imported, a response CSV file would be generated, containing cross- mapped information about tokens, customer IDs and emails associated with them.

For more information about importing tokens, please do not hestiate to contact us and / or review our API: https://emerchantpay.github.io/gateway-api-docs/#importation-of-external-tokens-and-card-details

We hope you found this guide useful. If you have any questions, please do not hesitate to contact your account manager.



emerchantpay

Tokenisation Merchant guide