Adding the PayPal payment button

Implementation Guide

Document version 3.9

Contents

1. HISTORY OF THE DOCUMENT

Version	Author	Date	Comment
3.9	BPCE Payment Services	2/6/2023	• Update of the *Payments by token and recurring payments* chapter. • Update of the *Setting up a notification on batch change* chapter. • Update of the chapter *Processing the response data*.
3.8	BPCE Payment Services	10/30/2020	• Addition of a warning message in the chapter *Payments by token and recurring payments*. • Addition of the values for field**vads_payment_error**specific to PayPal. • Update of the *Technical information* chapter. • Update of field values for**vads_auth_result**in the *Analyzing the result of the authorization request* chapter.
3.7	BPCE Payment Services	5/11/2020	• Format corrected for the field**vads_trans_date**. • Update of notification configuration. • Update of supported features. • Addition of chapters relating to multi-currency payments
3.6	BPCE Payment Services	11/20/2019	• Merge of the documents for immediate PayPal payment and deferred PayPal payment. • Correction of an error concerning the field**vads_payment_cards**. • Addition of chapters related to the recurring payment.
3.5	BPCE Payment Services	2/6/2018	Possibility to choose the signature computation algorithm (SHA-1 or SHA-256)
3.4	BPCE Payment Services	12/11/2017	Addition of chapters about multi-currency payments • Managing multi-currency payments • Managing currencies • Configuring your preferences for receiving payments
3.3	BPCE Payment Services	6/2/2017	• Update of the **Managing authorizations** chapter • Update of the chapter on the option**PayPal Reference Transactions**.
3.2	BPCE Payment Services	4/27/2017	• Update of the chapter on recurring payment • Addition of the chapter on the option**PayPal Reference Transactions**.
3.1	BPCE Payment Services	2/20/2017	• Update of the **Creating an account chapterPayPal** for accounts in Sandbox mode • Addition of the chapter on merchant protection • Addition of **vads_authent_paypal_protection_eligibility** for identifying the used type of protection • Update of screenshots with the **Authentication** tab in transaction details • Addition of the chapter on recurring payment

Version	Author	Date	Comment
3.0	BPCE Payment Services	10/25/2016	Documentation update: in the Merchant Back Office, PayPal MIDs are managed via the **Merchant IDs** tab and not in the **PayPal MIDs** tab.

2. PRESENTATION

PayPal is a payment method used in over 200 countries that supports 25 currencies.

It allows merchants to accept payments (immediate, deferred and recurring) made by card and via an accountPayPal.

Paying online withPayPalmeans paying without sharing financial information.

The buyer proceeds to payment by identifying him or herself with their e-mail address and password.

Supported currencies					
	• AUD	• EUR	• JPY	• NOK	• SGD
	• BRL	• HKD	• MYR	• PHP	• SEK
	• CAD	• HUF	• MXN	• PLN	• CHF
	• CZK	• INR	• TWD	• GBP	• THB
	• DKK	• ILS	• NZD	• RUB	• USD

Supported countries — More than 200 countries (*https://www.paypal.com/fr/webapps/mpp/country-worldwide*).

Additional information

- Support for immediate and deferred capture (PayPal MID option)
- Support for recurring payments (PayPal MID option)
- Transactions can take an intermediate status in case of suspected fraud (**UNDER_VERIFICATION**)

2.1. Immediate payment

During an immediate payment, the payment amount is immediately debited from the buyer's account. This is the default mode when you create a PayPal MID.

This mode does not support:

- deferred payments,
- manual payment validation,
- payment updates,
- payment cancellation.

In order to create an immediate payment request, all you need to do is transmit a capture delay (**vads_capture_delay** field) set to 0.

The validation mode (**vads_validation_mode** field) included in the payment request will then be ignored.

2.2. Deferred payment

In order to use this feature, ask your PayPal account manager to check whether the ORDER mode is enabled for your MID.

In case of a deferred payment, the buyer's account is not debited on the day of the payment.

The merchant defines a delay (strictly greater than 0 days) between the day of the order and the effective day of the debit.

This delay can be defined in the payment form via the **vads_capture_delay** parameter or via the Merchant Back Office (**Settings** > **Shop**, **Configuration** tab).

The deferred behavior if the capture delay is greater than the authorization validity period (3 days within the PAYPAL network).

If the capture delay is less or equal to 3 days:

An authorization is made on the payment day.

The capture will be made on the day of the requested presentation date.

If the capture delay is greater than 3 days:

On the payment day, an operation similar to a card pre-authorization is made.

The authorization will be made 3 days before the requested presentation date. The capture is always made on the day of the presentation date.

In order to be notified of the final result of the payment, the merchant must enable and configure the Instant Payment Notification URL on batch authorization (see chapter *Establishing interaction with the payment gateway* on page 20).

As long as the requested presentation date has not been reached, the following operations are available for transactions:

- amount update,
- modification of the presentation date,
- cancellation,
- validation.

2.3. Payments by token and recurring payments

> ℹ The services "Management of payments by token" and "Management of recurring payments" are optional.
>
> Merchants who want to use these services must sign up for an offer that includes these services.
>
> These 2 services also require the activation by the merchant of the option "Reference Transactions" via PayPal.

Management of payments by token

The service of Management of payments by token allows merchants to offer their clients the possibility to associate a token with a payment method, which will facilitate their subsequent payments on the website (without having to re-enter the bank card number).

Tokens allow you to:

• Make fast and secure payments.

  The buyer no longer has to fill in bank details when making subsequent payments (1-click payment).

  The payment gateway stores the buyer's e-mail address and a common identifier to communicate with PayPal. The banking data are hosted by PayPal, in accordance with PCI-DSS security standards.

• Make recurring payments (subscription).

The service also allows you to:

• Identify cards that are due to expire, in order to notify the Merchant via a file containing the token of the expiring card.

• Update the bank details associated with a token via the payment page, or manually via the Merchant Back Office.

• Manage other buyer detail updates.

In compliance with the banking data security and protection rules implemented by PCI DSS, the payment method details are destroyed after the associated token has not been used for 15 months.

The token will remain visible in the Merchant Back Office and can be updated with new details.

Recurring payment (subscription) management

The recurring payment management service allows merchants to create subscriptions, also known as recurring payments, with or without an expiry date, within the limits of the card validity period.

When creating a recurring payment, the Merchant defines the start date and the recurrence rule to apply.

In TEST mode, transactions are created every hour in order to allow the Merchant to easily test the IPN processing.

In PRODUCTION mode, transactions are created once a day between midnight and 5 am.

2.3.1. Enabling the "PayPal Reference Transactions" option

To allow the creation of payments by token and recurring payments via PayPal, the merchant must request the activation of the **PayPal Reference Transactions** option.

This option is enabled manually by your PayPal account manager or through your PayPal customer service: *https://www.paypal.com/fr/selfhelp/contact/call*

The delay for enabling the option can take from several days to several weeks.

2.3.2. Making recurring payments

Once the option**PayPal Reference Transactions**enabled by PayPal, the merchant must give the necessary permissions to the payment gateway (see chapter *Managing authorizations* on page 17).

Once this last action has been performed, the merchant can use the payment form for performing the following operations:

• Create a token,

• Create a token during a payment,

• Create a token when creating a recurring payment,

• Create a token when creating a recurring payment with a payment,

• Update information associated with a token,

• Use a token to perform a 1-click payment,

• Use a token to create a new recurring payment,

• Offer the possibility to create a token during a payment,

• Update information associated with a token during a payment.

For more information about recurring payments, see the *Implementation Guide Payment by token and recurring payment* available in our online document archive (*https://paiement.systempay.fr/doc/fr-FR/*).

2.4. Multi-currency payments

It is possible to accept payments in a currency that is different from the one specified in your contract.

To do so:

• You shop must have the option "**Payment in multiple currencies within one contract**".

  By default, your Systempay contract authorizes only one currency. With this option you will be authorized to configure several currencies for your PayPal contract.

  Contact E-commerce customer service to check if this option is available in your offer.

• You must set up your merchant accountPayPalfor accepting multi-currency payments.

To manage multi-currency payments via your merchant accountPayPal, you must:

• Manage different currencies,

• Configure your preferences for receiving payments.

2.4.1. Managing currencies

The currency management page can be accessed in two ways:

• via **Settings > My Profile > My Money > Currency management**,

• from the homepage via the menu **My Money**.

The currency management page allows you to:

- add a new currency,

- disable a currency,

- calculate conversion rates for your currencies.

The table below presents available currencies.

List of available currencies	
Thai Baht (THB)	New Zealand Dollar (NZD)
Danish Crown (DKK)	Euro (EUR)
Norwegian Crown (NOK)	Hungarian Forint (HUF)
Swedish Crown (SEK)	Swiss Franc (CHF)
Czech Crown (CZK)	Pound Sterling (GBP)
Australian Dollar (AUD)	Taiwan New Dollar (TWD)
Canadian Dollar (CAD)	New Israeli Shekel (ILS)
Hong Kong Dollar (HKD)	Russian Ruble (RUB)
Singapore Dollar (SGD)	Japanese Yen (JPY)
US Dollar (USD)	Polish Zloty (PLN)

2.4.2. Configuring your preferences for receiving payments

PayPal provides you with three options when you receive a payment in a currency that is different from the one defined in your contract:

- Accept the payment and convert the transaction amount into the currency defined in the contract.

  Example: the buyer pays in **dollars** and you convert the currency to **euros**.

- Reject the payment if it is not in the currency defined in the contract.

- Put the payment on hold.

  By default, your PayPal account offers this option of putting payments on hold.

  In this case, you decide how to proceed via your PayPal account. You can:

  - Accept the payment and convert the amount of the transaction into the currency defined in the contract.

  - Accept the payment and open a new account in the currency used by the buyer.

    Feature available for currencies supported by PayPal, see chapter *Managing currencies* on page 9.

  - Reject the payment.

  Note

  *If you receive a payment in a currency that is not mentioned among the available currencies and if your account is configured with this option of putting payments on hold **Ask me whether to accept or deny each individual payment**, you will only have two options (accept and convert into euro or reject the payment).*

  You will not have the option of accepting the payment and opening a new account in this new currency.

To configure your preferences for receiving payments

1. Sign in to your PayPal merchant account.

   Your merchant area appears.

2. Click **Settings**, then **My profile**.

   The preference configuration page appears.

3. Click **My selling tools**.

   The different options available for online sales appear.

4. Select the line **Block payments**.

   This option allows to configure payment limits, add instructions, etc.

5. Click **Update**.

   The **Preferences for receiving payments** page appears.

6. Enable the desired payment option among the 3 available options in **Allow payments sent to me in a currency I do not hold**.

   As explained in the beginning of the chapter, the option **Ask me whether to accept or deny each individual payment** is enabled by default.

   This option offers you flexibility, once the transaction is complete, to analyze each payment and decide what to do next.

7. Click **Save** to take your modifications into account.

2.5. Transaction settlement

PayPal transactions are supported by the following services:

• Visual transaction reconciliation,

• Bank reconciliation report

In order to display your PayPal transactions in the reporting files generated by the payment gateway, ask your PayPal account manager:

• to enable the **sftp reporting** option,

• to generate the **settlement report** files.

Once the options have been enabled, contact E-commerce customer service to activate the settlement services.

2.6. Benefiting from the merchant protection program

PayPaloffers a merchant protection program in the two following cases:

• An opposition or a cancellation has been made following an unauthorized payment.

  The payment must occur in PayPal environment.

• An opposition or a complaint has been filed for an unreceived object.

In both cases**PayPal**refunds the total amount to compensate for the damage suffered, provided that the conditions are met.

In order to benefit from the protection program, the merchant must:

1. Accept the requirements of**PayPal**on his account (the right to suspend accounts and/or eligibility in case of identified risk).

2. File a complaint for a transaction marked as eligible or partially eligible in the transaction details section of your account.

   The status of transaction's eligibility to merchant protection is also included in the transaction detail in your Merchant Back Office(see chapter *Viewing transaction details* on page 42).

3. Be able to provide proof of deposit (in case of a tangible item) or proof of delivery (in case of an intangible item or service).

4. Have transmitted shipping details in the payment request (see chapter *Transmitting shipping details* on page 31).

5. Have transmitted shopping cart details in the payment request (see chapter *Transmitting order details* on page 32).

6. Ship the order to the shipping address specified in the transaction details.

   Hand-delivery and shipping to another address are not covered by the protection.

7. Accept a single payment via a account**PayPal**.

   Split payments or payments in installments are not covered by the protection.

8. Have the possibility to provide PayPal with all required information or documents.

The protection is not automatically attributed to all merchants. For more information, please contactPayPalor visit their website at *https://www.paypal.com/fr/webapps/mpp/paypal-safety-and-security*.

This protection applies regardless of the merchant's country, but there might be differences in requirements**PayPal**. For more information on merchant protection, see *https://www.paypal.com/tc/webapps/mpp/ua/useragreement-full#9*

2.7. Learn more about the payment guarantee with PayPal

Payments are not guaranteed with PayPal.

However, when a payment is accepted it is also transferred.

If you are using the Order mode (deferred payment), it is important to respect the capture delays.

However, as soon as the capture has been made, the payment is transferred without exception. If PayPal returns the payment accepted status, the payment is always transferred.

3. INFORMATIONS TECHNIQUES

Valeurs du champ vads_card_brand	Devises supportées	Pays supportés	Durée de validité de l'autorisation	Cinématique de paiement
PAYPAL_SB PAYPAL	25 devises dont : EUR, USD, CHF, GBP, BRL	Plus de 200 pays dont : FR, US, CH, UK, BR.	0 jour en paiement immédiat. 3 jours en paiement différé.	Capture immédiate. Capture différée.

Canaux de vente	
e-commerce	✔
m-commerce	✔
Paiement manuel	✖
Serveur Vocal Interactif	✖
Ordre de paiement par e-mail/SMS	✔

Opération sur les transactions	
Annulation	✔
Remboursement	✔
Modification	✔
Validation	✔
Duplication	✔
Rapprochement manuel	✔

Type d'intégration	
Redirection	✔
Iframe	✖
Client JavaScript	✖
Formulaire de collecte de données	✔
API Web Services	✖
SDK Mobile	✖
Back Office	✖

Typologie de paiement	
Paiement immédiat	✔
Paiement différé	✔
Paiement en plusieurs fois	✖
Paiement par abonnement	✔
Paiement par fichier (alias ou par lot)	✔
Paiement 1 clic	✔
Paiement par wallet	✖

Divers	
Restitution dans les journaux	✔
Rapprochement des transactions	✔
Rapprochement des impayés	✖
Tentatives de paiement supplémentaires	✔

4. PREREQUISITES

For the merchant

The payment method additionPayPalto your merchant website consists in the following steps:

• select the **Payment via optionPayPal** with the help of the sales contact on your payment gateway.

• create a Merchant ID (**MID)PayPal** if you do not have one yet.

• declaring your **contractPayPal** In your Merchant Back Office.

For the buyer

Signing up toPayPalis free and is completed on the website ofPayPal. The buyer must:

• Create an accountPayPalby registering an e-mail address and a password.

• Fill in all their personal details, address, etc.

• Fill in all their credit card details.

4.1. Creating an accountPayPalProfessional

1. If you do not have a merchant PayPal account yet, you can open one at:

https://www.paypal.com/fr/webapps/mpp/merchant

You will have to create:

• an accountPayPalprofessional in Live mode for accepting real payments.

• A professional PayPal account in Sandbox mode for accepting test payments.

• A personal PayPal account in Sandbox mode for accepting test payments.

2. Select the solutionPayPalthat best suits your business needs.

At the end of the registration process,PayPalsends an e-mail of registration confirmation. Follow the steps to validate your subscription. Otherwise, your account will not be activated.

4.2. Configuring your Merchant Back Office for using PayPal

1. Sign in to your Merchant Back Office available at this address:
   https://paiement.systempay.fr/vads-merchant/

2. Click **Settings** > **Company** > **Merchant IDs** tab.

3. Click **Create a Merchant ID (MID)**

4. Select a PayPal Merchant ID type.

5. Enter your **PayPal ID**.
   Your PayPal ID corresponds to the e-mail address that you used to create a PayPal account.

6. Select the currency.

7. Click **Next**

8. Customize your payment constraints:
   - Authorized refund
   - Maximum refund
   - Maximum gap

9. Click **Finish**

4.3. Managing authorizations

In order to receive payments on your PayPal account, you must give permissions to the payment gateway.

To do so:

1. Click **Settings** > **Company** > **Merchant IDs** tab.

2. Select your PayPal MID.
The details of the PayPal MID appear at the bottom of the screen.

4.3.1. Authorization for single payments

This step is mandatory.
Without these authorizations, PayPal will not be suggested on the payment page.

- In the **Authorization management** view, click the **Give the authorization** button to authorize the payment gateway to automatically direct payments to your PayPal account.

- Once redirected to the PayPal website, sign in to PayPal using your login and password.

- Follow the instructions to accept permissions.

- When you return to your Merchant Back Office, click **Save**.

4.3.2. Authorization for recurring payments

- In the **Authorization management** view, click the **Give token permission** button to authorize the payment gateway to automatically direct recurring payments to your PayPal account.

A confirmation message is displayed to inform you about the necessary steps.
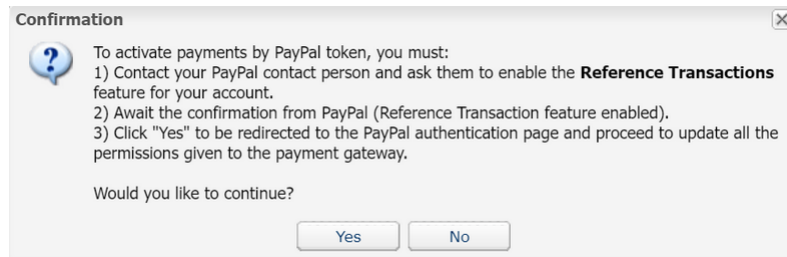
- Click **Yes** to be redirected to the PayPal website.

- Sign in using your PayPal login and password.

- Follow the instructions to accept permissions.

- Once you have been redirected to your Merchant Back Office, click **Save**.

For more information on the activation request of the **Reference Transactions** feature, please refer to chapter *Enabling the "PayPal Reference Transactions" option* **on page 8**.

4.4. Associating a PayPal MID with a shop

To include the PayPal payment method on your payment page, you must associate the PayPal MID with your shop. Two options are available:

- In the **Settings** > **Company** menu > **Merchant IDs** tab

- In the **Settings** > **Shop** menu > **MID association** tab

1. Click on **Settings > Company** menu > **Merchant IDs** tab.
2. Select your PayPal MID.
   The details of the PayPal MID appears at the bottom of the screen.
3. Click **Associate with a shop** (lower part of the screen) to associate the MID with the shop.
4. Choose the shop(s) in the dialog box.
5. Click **Save**.

OR

1. Click on **Settings** > Shop > **MID association** tab.
2. Select the PayPal MID from the available MID list.
3. Click the **Associate** button <u>or</u> drag and drop it to **Associated MID** on the right side.
4. Click **Save**.

5. PAYMENT PROCESS

The diagram below presents the exchange process from the point of view of the buyer.
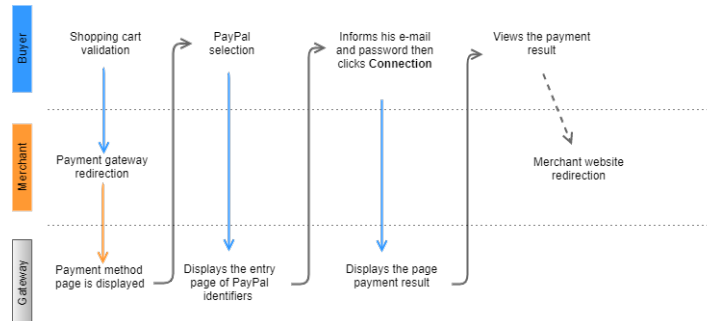
Figure 1: Payment process - as seen by the buyer

1. The buyer validates the shopping cart.

2. The merchant website redirects the buyer to the payment gateway. The redirection is done via an HTML POST form using HTTPS. The parameters of the form are described in the chapter **Generating a payment form**.

3. When the parameters and their signature have been verified, the payment method selection page appears.

Figure 2: Selecting a payment method

If the payment method has been specified in the form, the buyer moves on directly to step 7.

4. The buyer selects the **PayPal** payment method.

5. The buyer clicks **Validate**.

   The payment gateway prompts you to wait several seconds. It redirects you to the PayPal website.

6. The buyer is prompted to select their payment mode.

   The buyer can sign in to their PayPal account to pay or create a PayPal account to pay faster in the future.

7. If the buyer has a PayPal account, they sign in using their e-mail address and password.

   If the buyer does not have a PayPal account, they select their card and fill in the required details.

8. The buyer verifies the information related to their payment.

9. The buyer clicks **Pay**.

10. The buyer is redirected to the payment gateway.

    In case of success, a summary page is presented to the buyer with a summary of transaction details.

    A link at the bottom of the page allows to return to the shop.

    In case the transaction fails, a message appears. The buyer will be informed if the payment request has been rejected.

    A link at the bottom of the page allows to return to the shop.

6. ESTABLISHING INTERACTION WITH THE PAYMENT GATEWAY

The interaction with the payment gateway is described in the *Implementation Guide Hosted Payment Page*, available in our online documentation archive.

The merchant website and the payment gateway interact by exchanging data.

To create a payment, this data is sent in an HTML form via the buyer's browser.

At the end of the payment, the result is transmitted to the merchant website in two ways:

- automatically by means of notifications called Instant Notification URLs (also known as IPN or Instant Payment Notification).

- Via the browser when the buyer clicks the button to return to the merchant website.

To guarantee the security of the exchange, the data is signed with a key known only to the merchant and the payment gateway.

7. SETTING UP NOTIFICATIONS

The Merchant Back Office provides several types of notifications.

• Instant Payment Notification URL call

• E-mail sent to the merchant

• E-mail sent to the buyer

• SMS sent to the merchant

• SMS sent to the buyer

They allow to manage the events (payment accepted, payment abandoned by the buyer, payment canceled by the merchant, etc.) that will trigger a notification sent to the merchant website, the merchant or the buyer.

> ⚠️ **The notifications of Instant Payment Notification URL call type are very important as they represent the only reliable way for the merchant website to obtain the payment result.**

If the payment gateway is unable to access the URL of your page, an e-mail will be sent to the shop administrator.

It contains:

• The HTTP code of the encountered error

• Parts of error analysis

• Its consequences

• Instructions via the Merchant Back Office to resend the request to the previously defined URL.

To access notification rule management:

Go to the following menu **Settings** > **Notification rules**.

7.1. Setting up the Instant Payment Notification

This rule allows to notify the merchant website in the following cases:

- Payment accepted
- Payment refused
- Payment canceled or abandoned by the buyer
- Payment waiting for verification.

This notification is required to communicate the result of the payment request.

It will inform the merchant website of the payment result even if your client has not clicked the "Return to the shop" button.

1. Right-click **Instant Payment Notification URL at the end of the payment**.

2. Select **Manage the rule**.

3. Enter the **E-mail address(es) to notify in case of failure** field in the **General settings** section.
   To specify several e-mail addresses, separate them with a semi-colon.

4. Check the box **Automatic retry in case of failure** if you wish to authorize the gateway to automatically resend the notification in case of a failure (can be done up to 4 times).

5. In the **Instant Payment Notification URL of the API form V1, V2** section, specify the URL of your page in the fields **URL to notify in TEST mode** and **URL to notify in PRODUCTION mode** if you wish to receive notifications in the API form format.

6. Save the changes.

7.2. Setting up notifications in case of abandoned or canceled payments

This rule allows to notify the merchant website in the following cases:

• When the buyer abandons/cancels a payment - via the **Cancel and return to shop** button.

• When the buyer has not completed the payment and the payment session has expired.
  The maximum length of a payment session is 10 minutes.

This rule is **disabled by default**.

1. Right-click **Instant Payment Notification URL on cancellation**.

2. Select **Manage the rule**.

3. Enter the **E-mail address(es) to notify in case of failure** field in the **General settings** section.
   To specify several e-mail addresses, separate them with a semi-colon.

4. Check the box **Automatic retry in case of failure** if you wish to authorize the gateway to automatically resend the notification in case of a failure (can be done up to 4 times).

5. In the **Instant Payment Notification URL of the API form V1, V2** section, specify the URL of your page in the fields **URL to notify in TEST mode** and **URL to notify in PRODUCTION mode** if you wish to receive notifications in the API form format.

6. Save the changes.

7. Enable the rule by right-clicking **Instant Payment Notification URL on cancellation** and select **Enable the rule**.

7.3. Setting up a notification on batch authorization

During a deferred payment, the payment is created with a **Waiting for authorization** status if the delay between the order date and the requested capture date is greater than the authorization validity period.

The **Instant Payment Notification URL on batch authorization** is called to retrieve the final status and update the transaction.

This rule is **disabled by default**.

In order to be notified of the final status:

1. Right-click **Instant Payment Notification URL on batch authorization**.

2. Select **Manage the rule**.

3. Enter the **E-mail address(es) to notify in case of failure** field in the **General settings** section.
   To specify several e-mail addresses, separate them with a semi-colon.

4. Check the box **Automatic retry in case of failure** if you wish to authorize the gateway to automatically resend the notification in case of a failure (can be done up to 4 times).

5. In the **Instant Payment Notification URL of the API form V1, V2** section, specify the URL of your page in the fields **URL to notify in TEST mode** and **URL to notify in PRODUCTION mode** if you wish to receive notifications in the API form format.

6. Save the changes.

7. Enable the rule by right-clicking **Instant Payment Notification URL on batch authorization** and select **Enable the rule**.

7.4. Setting up a notification on batch change

The payment gateway can notify the merchant website in the following cases:

- When a transaction expires (its status changes from To be validated to Expired),

- When a transaction that has been blocked due to suspected fraud is finally accepted or refused. Its status changes from **UNDER_VERIFICATION** to **CAPTURED** or **REFUSED**.

- when a transaction following a payment by token or recurring payment is finally accepted or refused. Its status changes from **AUTHORISED** to **CAPTURED** or **CAPTURE_FAILED**.

This rule is **disabled by default**.

To set up this notification:

1. Right-click **Instant Payment Notification URL on batch change**.

2. Select **Manage the rule**.

3. Enter the **E-mail address(es) to notify in case of failure** field in the **General settings** section.
   To specify several e-mail addresses, separate them with a semi-colon.

4. Check the box **Automatic retry in case of failure** if you wish to authorize the gateway to automatically resend the notification in case of a failure (can be done up to 4 times).

5. In the **Instant Payment Notification URL of the API form V1, V2** section, specify the URL of your page in the fields **URL to notify in TEST mode** and **URL to notify in PRODUCTION mode** if you wish to receive notifications in the API form format.

6. Save the changes.

7. Enable the rule by right-clicking **Instant Payment Notification URL on batch change** and select **Enable the rule**.

8. GENERATING A PAYMENT FORM

To generate a payment request, you must create an HTML form as follows:

```
<form method="POST" action="https://paiement.systempay.fr/vads-payment/">
 <input type="hidden" name="parameter1" value="value1" />
 <input type="hidden" name="parameter2" value="value2" />
 <input type="hidden" name="parameter3" value="value3" />
 <input type="hidden" name="signature" value="signature"/>
 <input type="submit" name="pay" value="Pay"/>
</form>
```

It contains:

• The following technical elements:

   • The <form> and </form> tags that allow to create an HTML form.

   • The method="POST" attribute that defines the method used for sending data.

   • The action="https://paiement.systempay.fr/vads-payment/" attribute that defines where to send the form data.

• Form data:

   • The shop ID.

   • Information about the payment depending on the use case.

   • Additional information depending on your needs.

   • The signature that ensures the integrity of the form.

   This data is added to the form by using the <input> tag:

   <input type="hidden" name="parameter1" value="value1" />

   For setting the name and value attributes, see the **Data dictionary** chapter also available in the online document archive.

   All the data in the form must be encoded in **UTF-8.**

   This will allow for the special characters (accents, punctuation marks, etc.) to be correctly interpreted by the payment gateway. Otherwise, the signature will be computed incorrectly and the form will be rejected.

• The **Pay** button for submitting the data:

   <input type="submit" name="pay" value="Pay"/>

Different use cases are presented in the chapters below. They will allow you to adapt your payment form to your needs.

The following table lists the different formats that you can encounter when building your form.

Notation	Description
a	Alphabetic characters (from 'A' to 'Z' and from 'a' to 'z')
n	Numeric characters
s	Special characters
an	Alphanumeric characters
ans	Alphanumeric and special characters (except '<' and '>')
3	Fixed length of 3 characters
..12	Variable length up to 12 characters
json	JavaScript Object Notation. Object containing key/value pairs separated by commas. It starts with a left brace "{" and ends with a right brace "}". Each key / value pair contains the name of the key between double-quotes followed by " : ", followed by a value. The name of the key must be alphanumeric. The value can be: • a chain of characters (in this case it must be framed by double-quotes) • a number • an object • a table • a boolean • empty Example: {"name1":45,"name2":"value2", "name3":false}
bool	Boolean. Can be populated with the **true** or **false** value.
enum	Defines a field with a complete list of values. The list of possible values is given in the field definition.
Enum list	List of values separated by a " ; ". The list of possible values is given in the field definition. Example: vads_available_languages=fr;en
map	List of key / value pairs separated by a " ; ". Each key / value pair contains the name of the key followed by " = ", followed by a value. The value can be: • a chain of characters • a boolean • a json object • an xml object The list of possible values for each key/value pair is provided in the field definition. Example: vads_theme_config=SIMPLIFIED_DISPLAY=true;RESPONSIVE_MODEL=Model_1

8.1. Creating an immediate paymentPayPal

1. Use all the fields presented in the table below to create your payment form.

Field name	Description	Format	Value
vads_payment_cards	Allows to force the card type to be used. It is recommended to provide a different payment button for each payment method on the merchant website. **It is recommended not to leave the field empty**.	enum	**PAYPAL_SB;PAYPAL**to directly call the PayPal payment button in test mode or in production mode.
vads_site_id	Shop ID	n8	E.g.: 12345678
vads_ctx_mode	Mode of interaction with the payment gateway	enum	**TEST** or**PRODUCTION**
vads_trans_id	Transaction number. Must be unique within the same day (from 00:00:00 UTC to 23:59:59 UTC). **Warning: this field is not case sensitive.**	an6	E.g.: xrT15p
vads_trans_date	Date and time of the payment form in UTC format	n14	Respect the YYYYMMDDHHMMSS format E.g.: 20200101130025
vads_amount	Payment amount in the smallest currency unit(cents for euro).	n..12	E.g.: 4525 for EUR 45.25
vads_currency	Code of the currency used for the payment. See *the list of supported currencies*.	n3	E.g.: 978 for euro (EUR)
vads_action_mode	Acquisition mode for payment method data	enum	**INTERACTIVE**
vads_page_action	Action to perform	enum	**PAYMENT**
vads_version	Version of the exchange protocol with the payment gateway	enum	**V2**
vads_payment_config	Payment type	enum	**SINGLE**
vads_capture_delay	Capture delay	n..3	**0**
vads_validation_mode	Validation mode	n1	**0** (Automatic)

2. Add the optional fields described in the following chapters according to your requirements.

3. Compute the value of the **signature** field using all the fields of your form that start with **vads_** (see chapter **Computing the signature** of the *Implementation Guide Hosted Payment Page* available on our website).

8.2. Creating a deferred paymentPayPal

In order to use this feature, ask your PayPal account manager to check whether the ORDER mode is enabled for your MID.

1. Use all the fields presented in the table below to create your payment form.

Field name	Description	Format	Value
vads_payment_cards	Allows to force the card type to be used. It is recommended to provide a different payment button for each payment method on the merchant website. **It is recommended not to leave the field empty**.	enum	**PAYPAL_SB;PAYPAL**to directly call the PayPal payment button in test mode or in production mode.
vads_site_id	Shop ID	n8	E.g.: 12345678
vads_ctx_mode	Mode of interaction with the payment gateway	enum	**TEST** or**PRODUCTION**
vads_trans_id	Transaction number. Must be unique within the same day (from 00:00:00 UTC to 23:59:59 UTC). **Warning: this field is not case sensitive.**	an6	E.g.: xrT15p
vads_trans_date	Date and time of the payment form in UTC format	n14	Respect the YYYYMMDDHHMMSS format E.g.: 20200101130025
vads_amount	Payment amount in the smallest currency unit(cents for euro).	n..12	E.g.: 4525 for EUR 45.25
vads_currency	Code of the currency used for the payment. See *the list of supported currencies*.	n3	E.g.: 978 for euro (EUR)
vads_action_mode	Acquisition mode for payment method data	enum	**INTERACTIVE**
vads_page_action	Action to perform	enum	**PAYMENT**
vads_version	Version of the exchange protocol with the payment gateway	enum	**V2**
vads_payment_config	Payment type	enum	**SINGLE**
vads_capture_delay	Delay before capture in the bank, **the value must be greater than 0**	n..3	**E.g.: 3**
vads_validation_mode	Specifies the validation mode of the transaction (manually by the merchant, or automatically by the payment gateway).	n1	**0** or **1** or **absent** or **empty**

2. Add the optional fields described in the following chapters according to your requirements.

3. Compute the value of the **signature** field using all the fields of your form that start with **vads_** (see chapter **Computing the signature** of the *Implementation Guide Hosted Payment Page* available on our website).

8.3. Creating a payment by token or a recurring payment

All the use cases described in the *Implementation Guide Payment by token and recurring payment* available on our website (*https://paiement.systempay.fr/doc/fr-FR/*) can be used in PayPal payment method.

Please see this guide for the list of parameters to be transmitted according to your use case.

8.4. Transmitting buyer details

The Merchant can specify the buyer's billing details (e-mail address, title, phone number, etc.). This information will be used to create the invoice.

All the data transmitted via the payment form can be viewed in the transaction details in the Merchant Back Office (**Buyer** tab).

Use optional fields according to your requirements. *These fields will be returned with the response and will include the value transmitted in the form.*

Field name	Description	Format	Value
vads_cust_email	Buyer's e-mail address	ans..150	E.g.: abc@example.com
vads_cust_id	Buyer reference on the merchant website	an..63	E.g.: C2383333540
vads_cust_title	Buyer's title	an..63	E.g.: M
vads_cust_status	Status	enum	**PRIVATE**: for a private individual **COMPANY**: for a company
vads_cust_first_name	First name	ans..63	E.g.: Laurent
vads_cust_last_name	Last name	ans..63	E.g.: Durant
vads_cust_legal_name	Buyer's legal name	ans..100	E.g.: D. & Cie
vads_cust_cell_phone	Cell phone number	an..32	E.g.: 06 12 34 56 78
vads_cust_address_number	Street number	ans..64	E.g.: 109
vads_cust_address	Postal address	ans..255	E.g.: Rue de l'Innovation
vads_cust_address2	Address line 2	ans..255	E.g.:
vads_cust_district	District	ans..127	E.g.: Downtown
vads_cust_zip	Zip code	an..64	E.g.: 31670
vads_cust_city	City	an..128	E.g.: Labège
vads_cust_state	State / Region	ans..127	E.g.: Occitanie
vads_cust_country	Country code in compliance with the ISO 3166 alpha-2 standard	a2	E.g.: "FR" for France, "PF" for French Polynesia, "NC" for New Caledonia, "US" for the United States.

8.5. Transmitting shipping details

The merchant can transmit the buyer's shipping details (e-mail address, title, phone number etc.).

To benefit from the PayPal merchant protection, you must imperatively transmit this data via the payment form. The protection only concerns orders that require shipping. The shipping address known to PayPal must be exactly the same as the one where the package is sent.

This information can be found in the transaction details in the Merchant Back Office (**Shipping tab**).

Use optional fields according to your requirements.

Field name	Description	Format	Value
vads_ship_to_city	City	an..128	E.g.: Bordeaux
vads_ship_to_country	Country code in compliance with the ISO 3166 standard (required for triggering one or more actions if the **Shipping country control** profile is enabled).	a2	E.g.: FR
vads_ship_to_district	District	ans..127	E.g.: La Bastide
vads_ship_to_first_name	First name	ans..63	E.g.: Albert
vads_ship_to_last_name	Last name	ans..63	E.g.: Durant
vads_ship_to_legal_name	Legal name	an..100	E.g.: D. & Cie
vads_ship_to_phone_num	Phone number	ans..32	E.g.: 0460030288
vads_ship_to_state	State / Region	ans..127	E.g.: Nouvelle Aquitaine
vads_ship_to_status	Allows to specify the type of the shipping address.	enum	**PRIVATE** : for shipping to a private individual **COMPANY** : for shipping to a company
vads_ship_to_street_number	Street number	ans..64	E.g.: 2
vads_ship_to_street	Postal address	ans..255	E.g.: Rue Sainte Catherine
vads_ship_to_street2	Address line 2	ans..255	
vads_ship_to_zip	Zip code	an..64	E.g.: 33000

Note:

The fields below are required and must be correctly filled out to enable you to benefit from the PayPal merchant protection.

vads_ship_to_city, vads_ship_to_country, vads_ship_to_first_name, vads_ship_to_last_name, vads_ship_to_legal_name, vads_ship_to_phone_num, vads_ship_to_state, vads_ship_to_street, vads_ship_to_street2, vads_ship_to_zip

This list is provided for information purposes and may be subject to modification by PayPal. Please read the PayPal Terms of Use in order to benefit from this merchant protection.

8.6. Transmitting order details

The Merchant can transmit the shopping cart content in his or her payment request in order to display it on PayPal payment pages.

The information below is necessary for benefiting from merchant protection provided by PayPal.

This information can be found in the transaction details in the Merchant Back Office (**Shopping cart** tab).

1. Use optional fields according to your requirements. These fields will be returned with the response and will include the value transmitted in the form.

Field name	Description	Format	Value
vads_order_id	Order ID Can contain uppercase or lowercase characters, numbers or hyphens ([A-Z] [a-z], 0-9, _, -).	ans..64	E.g.: 2-XQ001
vads_order_info	Additional order info	ans..255	E.g.: Door code 3125
vads_order_info2	Additional order info	ans..255	E.g.: No elevator
vads_order_info3	Additional order info	ans..255	E.g.: Express
vads_nb_products	Number of items in the cart	n..12	E.g.: 2
vads_product_labelN	Item name. N corresponds to the index of the item (0 for the first one, 1 for the second one, etc.).	ans..255	E.g.: vads_product_label0 = "tee-shirt" vads_product_label1 = "Biscuit" vads_product_label2 = "sandwich"
vads_product_amountN	Price of the item incl. VAT. N corresponds to the index of the item (0 for the first one, 1 for the second one, etc.).	n..12	E.g.: vads_product_amount0 = "1200" vads_product_amount1 = "800" vads_product_amount2 = "950"
vads_product_typeN	Item type. N corresponds to the index of the item (0 for the first one, 1 for the second one, etc.).	enum	E.g.: vads_product_type0 = "CLOTHING_AND_ACCESSORIES" vads_product_type1 = "FOOD_AND_GROCERY" vads_product_type2 = "FOOD_AND_GROCERY"
vads_product_refN	Item reference. N corresponds to the index of the item (0 for the first one, 1 for the second one, etc.).	an..64	E.g.: vads_product_ref0 = "CAA-25-006" vads_product_ref1 = "FAG-B5-112" vads_product_ref2 = "FAG-S9-650"
vads_product_qtyN	Item quantity. N corresponds to the index of the item (0 for the first one, 1 for the second one, etc.).	n..12	E.g.: vads_product_qty0 = "1" vads_product_qty1 = "2" vads_product_qty2 = "2"
vads_shipping_amount	Shipping fee amount	n..12	
vads_tax_amount	Tax amount for the entire order	n..12	
vads_insurance_amount	Insurance amount for the entire order	n..12	

2. Value the field**vads_nb_products**where the number of the articles in the cart.

> This field becomes mandatory for the shopping cart to be taken into account.
>
> *When it is populated, the **Shopping cart** tab becomes available in the transaction details in the Merchant Back Office.*
>
> *However, if the other fields beginning with**vads_product_**are not populated, the tab will not contain any information. For this reason, by populating the field**vads_nb_products**, it becomes mandatory to populate the other fields starting with**vads_product_**.*

3. Value the field **vads_product_amountN** with the amount for the items in the cart, using the smallest currency unit.

N corresponds to the index of the item (0 for the first one, 1 for the second one, etc.).

4. Value the field **vads_product_typeN** with the value corresponding to the item type.

N corresponds to the index of the item (0 for the first one, 1 for the second one, etc.).

Value	Description
FOOD_AND_GROCERY	Food and grocery
AUTOMOTIVE	Cars / Moto
ENTERTAINMENT	Entertainment / Culture
HOME_AND_GARDEN	Home / Gardening
HOME_APPLIANCE	Household appliances
AUCTION_AND_GROUP_BUYING	Auctions / Group purchasing
FLOWERS_AND_GIFTS	Flowers / Presents
COMPUTER_AND_SOFTWARE	Computers / Software
HEALTH_AND_BEAUTY	Health / Beauty
SERVICE_FOR_INDIVIDUAL	Services for individuals
SERVICE_FOR_BUSINESS	Services for companies
SPORTS	Sports
CLOTHING_AND_ACCESSORIES	Clothes / Accessories
TRAVEL	Travel
HOME_AUDIO_PHOTO_VIDEO	Audio / Photo / Video
TELEPHONY	Telephony

5. Value the field **vads_product_labelN** with the label of each article in the cart.

N corresponds to the index of the item (0 for the first one, 1 for the second one, etc.).

6. Value the field **vads_product_qtyN** with the quantity of each article in the cart.

N corresponds to the index of the item (0 for the first one, 1 for the second one, etc.).

7. Value the field **vads_product_refN** with the reference of each article in the cart.

N corresponds to the index of the item (0 for the first one, 1 for the second one, etc.).

8. Value the field **vads_shipping_amount** with the shipping fees amount for the entire order.

The amount is expressed in the smallest currency unit. E.g.: 4525 for EUR 45.25 .

9. Value the field **vads_tax_amount** with the tax amount for the entire order.

The amount is expressed in the smallest currency unit. E.g.: 4525 for EUR 45.25 .

10. Value the field **vads_insurance_amount** with the insurance amount for the entire order.

The amount is expressed in the smallest currency unit. E.g.: 4525 for EUR 45.25 .

11. Control the value of the field **vads_amount**. It must correspond to the total amount of the order.

Note:

The applied equation is:

Sum (vads_product_qty(N) x vads_product_amount(N)) + vads_shipping_amount + vads_tax_amount + vads_insurance_amount = vads_amount

*If the value specified in the **vads_amount** field is incorrect, your payment form is rejected due to an amount error.*

8.7. List of supported currencies

Currency	ISO 4217 encoding	Number of digits after the decimal point
Australian Dollar (AUD)	036	2
Brazilian Real (BRL)	986	2
Czech Crown (CZK)	203	2
Danish Crown (DKK)	208	2
Euro (EUR)	978	2
Hong Kong Dollar (HKD)	344	2
Hungarian Forint (HUF)	348	2
Indian Rupee (INR)	356	2
Japanese Yen (JPY)	392	0
Malaysian Ringgit (MYR)	458	2
Mexican Peso (MXN)	484	2
Taiwan New Dollar (TWD)	901	2
New Zealand dollar (NZD)	554	2
Norwegian Crown (NOK)	578	2
Philippine Peso (PHP)	608	2
Polish Zloty (PLN)	985	2
Pound Sterling (GBP)	826	2
Russian Ruble (RUB)	643	2
Singapore Dollar (SGD)	702	2
Swedish Crown (SEK)	752	2
Swiss Franc (CHF)	756	2
Thai Baht (THB)	764	2
US Dollar (USD)	840	2

9. CHECKING FIELD CONSISTENCY

Your form contains the **vads_amount** field. This fields corresponds to the total amount of the order.

In order to make sure your form is valid, the payment gateway checks the specified value.

The applied equation is:

vads_amount = Sum (vads_product_qty(N) x vads_product_amount(N)) + vads_shipping_amount + vads_tax_amount + vads_insurance_amount

If the value specified in the **vads_amount** field is incorrect, your payment form is rejected due to an amount error.

10. SENDING THE PAYMENT REQUEST

The buyer will be able to finalize his/her purchase once he/she is redirected to the payment page.

The buyer's browser must transmit the payment form data.

10.1. Redirecting the buyer to the payment page

The URL of the payment gateway is:

https://paiement.systempay.fr/vads-payment/

Example of parameters sent to the payment gateway:

```
<form method="POST" action="https://paiement.systempay.fr/vads-payment/">
<input type="hidden" name="vads_action_mode" value="INTERACTIVE" />
<input type="hidden" name="vads_amount" value="12500" />
<input type="hidden" name="vads_ctx_mode" value="TEST" />
<input type="hidden" name="vads_currency" value="978" />
<input type="hidden" name="vads_cust_country" value="FR" />
<input type="hidden" name="vads_cust_email" value="me@example.com" />
<input type="hidden" name="vads_insurance_amount" value="500" />
<input type="hidden" name="vads_nb_products" value="2"/>
<input type="hidden" name="vads_order_id" value="CMD012859" />
<input type="hidden" name="vads_page_action" value="PAYMENT" />
<input type="hidden" name="vads_payment_cards" value="PAYPAL_SB;PAYPAL" />
<input type="hidden" name="vads_payment_config" value="SINGLE" />
<input type="hidden" name="vads_product_amount0" value="5000" />
<input type="hidden" name="vads_product_label0" value="product1" />
<input type="hidden" name="vads_product_qty0" value="2" />
<input type="hidden" name="vads_product_ref0" value="ref1" />
<input type="hidden" name="vads_product_amount1" value="1000" />
<input type="hidden" name="vads_product_label1" value="product2" />
<input type="hidden" name="vads_product_qty1" value="1" />
<input type="hidden" name="vads_product_ref1" value="ref2" />
<input type="hidden" name="vads_ship_to_first_name" value="Albert" />
<input type="hidden" name="vads_ship_to_last_name" value="Durant" />
<input type="hidden" name="vads_ship_to_phone_num" value="0556123456" />
<input type="hidden" name="vads_ship_to_state" value="Nouvelle aquitaine" />
<input type="hidden" name="vads_ship_to_street_number" value="2" />
<input type="hidden" name="vads_ship_to_street" value="Rue Sainte Catherine" />
<input type="hidden" name="vads_ship_to_zip" value="33000" />
<input type="hidden" name="vads_ship_to_city" value="Bordeaux" />
<input type="hidden" name="vads_ship_to_country" value="FR" />
<input type="hidden" name="vads_shipping_amount" value="500" />
<input type="hidden" name="vads_site_id" value="12345678" />
<input type="hidden" name="vads_trans_date" value="20190626101407" />
<input type="hidden" name="vads_trans_id" value="362812" />
<input type="hidden" name="vads_tax_amount" value="500" />
<input type="hidden" name="vads_version" value="V2" />
<input type="hidden" name="signature" value="NM25DPLKEbtGEHCDHn8MBT4ki6aJI/ODaWhCzCnAfvY="/>
<input type="submit" name="payer" value="Payer"/>
</form>
```

10.2. Processing errors

If the payment gateway detects an error while receiving the form, an error message will appear and the buyer will not be able to proceed to the payment.

In TEST mode

The message indicates the source of the error and provides a link to the error code description to help you fix it.

In PRODUCTION mode

The message simply indicates to the buyer that a technical problem has occurred.

In both cases the merchant receives a notification e-mail.

It contains:

• the source of the error,

• a link to possible causes to facilitate its analysis,

• all the fields of the form.

A description of the error codes with their possible causes is available on our website

https://paiement.systempay.fr/doc/en-EN/error-code/sitemap.html

Error codes specific to the payment methodPAYPAL :

Code	Message	Description of the error
10130	PAYPAL_TOKEN_NOT_SUPPORTED	You have requested to create a payment by token but you have not given the necessary permissions within your contract. Please remember that payment by token requires prior activation of the "Reference Transactions" option with your PayPal account manager. See the chapter *Managing authorizations* on page 17 to resolve the issue.
10131	PAYPAL_PERMISSIONS_NOT_GRANTED	In order to accept PayPal payments, you must authorize the payment gateway to make payments for you. See the chapter *Managing authorizations* on page 17 to resolve the issue.
10132	PAYPAL_PERMISSIONS_REMOVED	In order to accept PayPal payments, you must authorize the payment gateway to make payments for you. However, the permissions have been removed. See the chapter *Managing authorizations* on page 17 to resolve the issue.

11. ANALYZING THE PAYMENT RESULT

The analysis of the payment result is described in the *Hosted Payment Page Implementation Guide* available in our online documentation archive (*https://paiement.systempay.fr/doc/fr-FR/*).

This document only describes the steps for processing data relative to the response of a payment made with PayPal.

11.1. Processing the response data

Here is an example of analysis to guide you through processing the response data.

1. Identify the order by retrieving the value of **vads_order_id** if you have provided it in the payment form.

   Make sure that the order status has not been updated yet.

2. Retrieve the payment result transmitted in the field **vads_trans_status**.

   Its value allows you to define the order status.

VALUE	DESCRIPTION
AUTHORISED	**Waiting for capture** The merchant has requested the creation of a deferred payment or an token or recurring payment. ⚠️ Specific to payments by token and recurring payments. This status is temporary and does not indicate that the transaction will be accepted. At the time of capture, the transaction is in the "Captured transactions" tab of the Merchant Back Office with the status "Capture in progress". It is being validated byPaypal. • IfPaypalaccepts the transaction, the final status is **CAPTURED**, visible in the "Captured transactions" tab of the Merchant Back Office with the "presented" status. • IfPaypalrefuses the transaction, the final status is **CAPTURE_FAILED**, visible in the "Captured transactions" tab of the Merchant Back Office with the "malfunction" status. To be notified, the merchant must **imperatively** configure the notification rule "Instant Payment Notification URL on batch change" (see *Setting up a notification on batch change* **on page 25** chapter).
AUTHORISED_TO_VALIDATE	**To be validated** The transaction, created with manual validation, is authorized. The Merchant must manually validate the transaction in order for it to be captured. The transaction can be validated as long as the expiration date of the authorization request has not passed. If the authorization validity period has passed, the payment status changes to **EXPIRED**. The **Expired** status is final.
CANCELLED	**Canceled** The payment has been canceled by the merchant.
CAPTURED	**Captured** The merchant has requested the creation of an immediate payment. The transaction has been captured by the bank.

VALUE	DESCRIPTION
CAPTURE_FAILED	**Capture failed**
EXPIRED	**Expired** The expiry date of the authorization request has passed and the Merchant has not validated the transaction. The account of the cardholder will therefore not be debited.
REFUSED	**Refused** The transaction is refused. See the following chapter to obtain more information on the rejected payment.
UNDER_VERIFICATION	**Control in progress** PayPalretains the transaction because of suspected fraud. The payment will remain in the **Transactions is progress** tab until the verification process has been completed. The transaction will then take one of the following statuses:**AUTHORISED**or**REFUSED**. A notification will be sent to the Merchant to warn them about the status change (Instant Payment Notification on batch change).
WAITING_AUTHORISATION	**Waiting for authorization** The merchant has requested the creation of a payment deferred by more than 3 days.
WAITING_AUTHORISATION_TO_VALIDATE	**To be validated and authorized** The payment is waiting for validation by the merchant. 3 days prior to the capture date, and without validation by the merchant, the status will automatically become To be validated or Declined (depending on the authorization result).

3. If the payment is refused, you can check if the error is explained in the field **vads_payment_error**.

Value	Description
75	The operation was declined by PayPal.
88	Refund error: PayPal does not allow transaction refunds after 60 days.
173	Error within the Express Checkout PayPal service. Possible reason: Restricted Account. If your PayPal account is restricted, sign in to your *Resolution center* on the PayPal website.

4. Retrieve the field **vads_trans_uuid**containing the unique reference of the transaction generated by the payment server.

5. Retrieve the PayPal transaction reference transmitted in the field **vads_ext_trans_id**.

6. Retrieve the value of the field **vads_trans_date**to identify the payment date.

7. Retrieve the used amount and currency. To do this, retrieve the values of the following fields:

Field name	Description
vads_amount	Payment amount in the smallest currency unit.
vads_currency	Numeric code of the currency used for the payment.
vads_change_rate	Exchange rate used for calculating the effective payment amount (seevads_effective_amount).
vads_effective_amount	Payment amount in the currency used for the capture in the bank.
vads_effective_currency	Numeric code of the currency that will be used for the capture at the bank.

8. Retrieve the payment method data used for the payment by analyzing the following fields:

Field name	Description
vads_card_brand	Payment method. Set to **PAYPAL**.
vads_acquirer_network	Acquirer network. Set to:

Field name	Description
	• **PAYPAL**: for a production payment
	• **PAYPAL_SB**: for a test payment

9. Retrieve all the order, buyer and shipping details.

These details will be provided in the response only of they have been transmitted in the payment form. Their values are identical to the ones submitted in the form.

10. Save the value of the field **vads_authent_paypal_protection_eligibility**to identify the type of protection used for the transaction.

Three values are possible:

• ELIGIBLE

Merchant is protected by PayPal's Seller Protection Policy for unauthorized payments and Item Not Received.

• PARTIALLY_ELIGIBLE

Merchant is protected by PayPal's Seller Protection Policy for Item Not Received.

• INELIGIBLE

Merchant is not protected by PayPal's Seller Protection Policy for Item Not Received.

11. Proceed to order update.

11.2. Analyzing the result of the authorization request

The result of the authorization is specified in the **vads_auth_result** field.

Below are the values that can be returned during a PayPal payment:

Codes returned by the **PayPal** network:

Code	Description
0	Transaction accepted
10001	Internal error
10002	Restricted Account
10009	Transaction refused for one of the following reasons: • The partial refund amount must be less than or equal to the original transaction amount. • The partial refund must be in the same currency as the original transaction. • This transaction has already been fully refunded. • The time limit (60 days) for performing a refund for this transaction has been exceeded.
10422	Customer must choose new funding sources. The customer must return to PayPal to select new funding sources.
10486	This transaction couldn't be completed. Please redirect your customer to PayPal.
13113	The Buyer cannot pay with PayPal for this transaction. Inform the buyer that PayPal declined the transaction and to contact *PayPal Customer Service*.

# 12. MANAGING PAYPAL TRANSACTIONS FROM THE MERCHANT BACK OFFICE

12.1. Viewing transaction details

Transactions can be viewed in the Merchant Back Office via the **Management** > **Transactions** menu.

Reminder: for immediate payments, the capture delay is equal to zero. This means that the funds are captured directly. Therefore, there is no authorization.
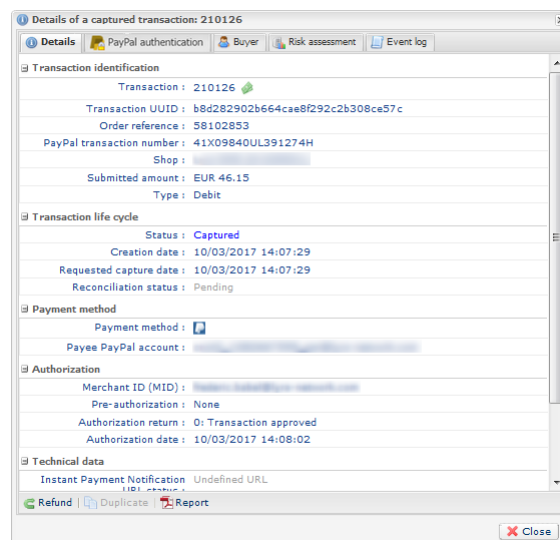
The PayPal transaction appears directly in the **Captured transactions** tab.

1. Select a PayPal transaction.

2. Rick click and select **Displaying transaction details with**.
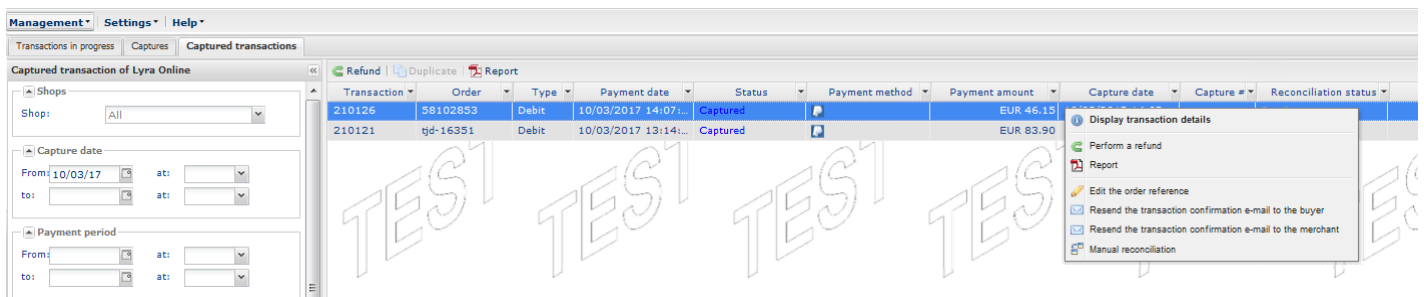
Transactions details are presented by tab.

The **Details** tab is displayed by default.

The details include:

- **The PayPal transaction number**

- **Transaction type**

  Debit in case of a payment, credit in case of a refund.

- **The transaction amount**

- **The PayPal account of the buyer who performed the payment**

- **The transaction status**

Captured status for an accepted immediate payment.

In some cases, PayPal retains a transaction because of suspected fraud.

The payment appears in the **Transactions is progress** tab with the status **Control in progress**.

Once PayPal completes its verification process, the payment will either be accepted or refused.

If you have correctly enabled and configured the Instant Payment Notification URL on batch change notification rule, you will be informed of the final result.

The **PayPal authentication** tab informs you if the transaction is eligible for merchant protection.

Three values are possible:

- ELIGIBLE

  Merchant is protected by PayPal's Seller Protection Policy for unauthorized payments and Item Not Received.

- PARTIALLY_ELIGIBLE

  Merchant is protected by PayPal's Seller Protection Policy for Item Not Received.

- INELIGIBLE

  Merchant is not protected by PayPal's Seller Protection Policy for Item Not Received.

The tabs **Shopping cart**, **Buyer** and **Delivery** contain the data transmitted in your payment form.
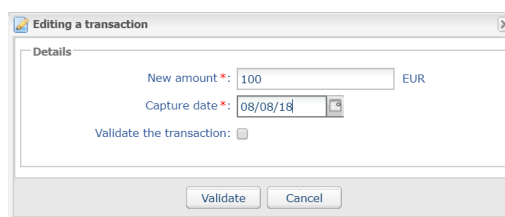
12.2. Modifying a transaction

The **Modify** option is only available for transactions with the following statuses:

- To be validated
- To be validated and authorized
- Waiting for authorization
- Waiting for capture

To modify a transaction:

1. Right-click the transaction

2. Select **Modify**.

3. Enter a new amount.

Unlike in the case of an immediate payment, as long as the transaction has not reached the presentation date, the merchant can modify the amount. The new amount must be lower than the initial amount.

4. Specify the presentation date.

The presentation date can be changed to an earlier or a later date.

- For transactions with **Waiting for capture** or **To be validated** status, the possible presentation range is 3 days. The authorization request valid for 3 days has already been made.

- For transactions with the **To be validated and authorized** or **Waiting for authorization** status, you can enter the presentation date of your choice.

It is also possible to validate a transaction with the **To be validated** or **To be validated and authorized** status by checking **Validate the transaction**.

5. Click **Validat**.

If you wish, you may view the transaction details to see the applied changes (right-click the edited transaction **Displaying transaction details with**).

12.3. Validating a transaction

The validation mode is automatic for immediate payments.

As for deferred payments, the merchant has the possibility to choose between manual and automatic validation.

If the merchant has opted for manual validation (vads_validation_mode set to 1 in the payment form), they will have to subsequently validate the payment in their Merchant Back Office.

In this case, the transaction status will be:

- **To be validated** if the initial capture delay is less than 3 days
- **To be validated and authorized** if the initial capture delay is more than 3 days

12.3.1. Validating a transaction with the status To be validated and authorized

This status appears when:

- The validation mode is manual
- The initial capture delay is more than 3 days

1. Right-click a PayPal transaction with the **To be validated and authorized** status.

2. Select **Validat**.

3. Confirm the validation of the selected transaction.

After validation, the status of the payment with a capture delay that is more than 3 days will change to **Waiting for authorization**.

The authorization will be made three days before the initially scheduled presentation date.

12.3.2. Validating a transaction with the status To be validated

This status appears when:

- The validation mode is manual
- The initial capture delay is less than 3 days

1. Right-click on the PayPal transaction with the **To be validated** status.

2. Select **Validat**.

3. Confirm the validation of the selected transaction.

The status of the transaction with a capture delay that is less or equal to 3 days will change to **Waiting for capture**.

12.4. Canceling a transaction

The **Cancel** operation is only available for the transactions that have not been captured.

1. Select a transaction with a right-click.

2. Select **Cancel**.

3. Confirm that you wish to definitively cancel the selected transaction.

The transaction status changes to **Canceled**.

Note

*It is possible to **cancel** several transactions at the same time.*

*For this, select all the transactions to be canceled. Press and hold down the **Ctrl key** and **click** for selecting multiple transactions.*

*After the selection, you can click **Cancel** using right-click or via the menu bar and confirm your choice.*

*The transaction statuses will change to **Canceled**.*

12.5. Capturing an order in installments

When receiving an order for which one of the items is no longer available, the merchant can partially capture the order amount.

To use this option, the merchant must:

- Subscribe to the offer allowing to capture an order in installments viaPayPal.
- Contact the payment gateway customer service to add this feature to their MIDPayPal.

Here is an example that illustrates this case:

The merchant receives a payment of EUR 45.25 100 for 2 items:

- An item for EUR 45.25 30 that can be shipped and captured immediately.
- A EUR 45.25 70 item that is not available in stock but that the merchant is able to obtain, ship and capture afterwards.

The steps for carrying out these two captures are:

1. Right-click the transaction for which you want to make multiple captures.

2. Select **Cancel**.

   This operation cancels the transaction.

   However, thanks to the functionality of the contractPayPalallows to make multiple captures per order, the order will remain open.

3. Confirm the cancellation of the selected transaction.

4. Double-click the transaction, which now has the **Canceled** status, to view the transaction details.

5. Click on **Duplicate** at the bottom of the detail window.

   This operation duplicates the canceled transaction to specify an amount and a presentation date for the first item's capture. The amount is partial (EUR 45.25 30).

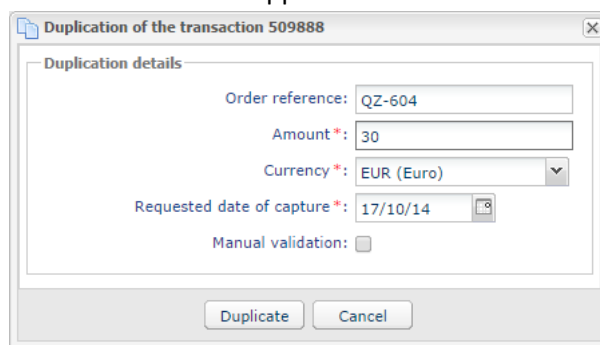   The dialog box **Duplication of the transaction** appears.

Figure 3: Duplicating a transaction

6. Enter the amount of the first item that you would like to capture (e.g. EUR 45.25 30) and its presentation date.

7. Click **Duplicate**.

   The transaction is duplicated. It refers to the amount of the first item in the order.

   To proceed to capturing the second item:

8. Double-click the transaction with the **Canceled** status to view the transaction details.

9. Click on **Duplicate** at the bottom of the detail window.

The dialog box **Duplication of the transaction** appears.

10. Enter the amount that corresponds to the amount of the second item (e.g. EUR 45.25 70) and its presentation date.

11. Click **Duplicate**.

The total amount of the initial transaction is captured (amount of item 1 + amount of item 2).

No other amounts can be captured for this transaction.

When partial captures appear in the **Captured transactions** tab with the **Captured** status, you must close the initial transaction.

If you do not close the transaction, the **Payment in progress** status will be indefinitely shown in your buyer's accountPayPal.

However, if you close the order while some transactions linked to this order are still visible in the **Transactions is progress** tab, you will cancel these transactions.

Be careful and make sure to wait until all the payments linked to an order appear in the **Captured transactions** tab with a **Captured** status before closing the transaction.

12. Right-click the transaction with the **Canceled** status.

13. Select **Close**.

The initial transaction is closed. The order has been correctly captured in installments.

12.6. Partially capturing an order

When receiving an order for which one of the items is no longer available, the merchant can partially capture the order amount.

Here is an example that illustrates this case:

The merchant receives a payment of EUR 45.25 100 for 2 items:

• An item for EUR 45.25 30 that the merchant can immediately ship and capture.

• An item for EUR 45.25 70 that the merchant no longer possesses and that they will not be able to honor.

In this case, the steps are:

1. Right-click the transaction that you want to partially capture.

2. Select **Cancel**.

This operation cancels the transaction.

However, thanks to the functionality of the contractPayPalallows to make multiple captures per order, the order will remain open.

3. Confirm the cancellation of the selected transaction.

4. Double-click the transaction, which now has the **Canceled** status, to view the transaction details.

5. Click on **Duplicate** at the bottom of the detail window.

This operation duplicates the canceled transaction to specify an amount and a presentation date for the first item's capture. The amount is partial (EUR 45.25 30).

The dialog box **Duplication of the transaction** appears.

Figure 4: Duplicating a transaction

6. Enter the amount of the first item that you would like to capture (e.g. EUR 45.25 30) and its presentation date.

7. Click **Duplicate**.

The transaction is duplicated. It refers to the amount of the first item in the order.

Once this partial capture is sent toPayPaland appears in the **Captured transactions** tab with a **Captured** status, you may close the order.

8. Right-click the transaction with the **Canceled** status.
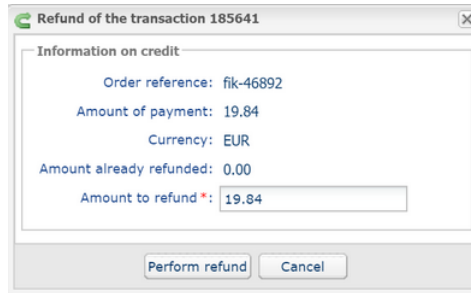
9. Select **Close**.

No other amounts can be captured for this transaction.

The buyer's account is only debited for the amount of the first item.

12.7. Refunding a captured transaction

Similarly to bank card transactions, it is possible to refund a part of the amount until its paid in full within the 60 days following the initial payment date.

1. Right-click a transaction.

2. Select **Making a refund**.

3. Enter the amount that you want to refund.

4. Click **Perform refund**.

Details of this operation appear.

12.8. Manual reconciliation

This operation allows you to manually reconcile merchant's payments from an account statement.

1. Search for the relevant transaction via the **Captured transactions** tab.

2. Right-click the transaction.

3. Select **Manual reconciliation**.

4. Click **Yes** to confirm the manual reconciliation of the selected transaction.
The **Comment** dialog box appears.

5. Enter a comment for this reconciliation.

6. Click **OK**.

The transaction status changes to **Reconciled**.

13. OBTAINING HELP

Looking for help? Check our FAQ on our website

https://paiement.systempay.fr/doc/en-EN/faq/sitemap.html

For any technical inquiries or if you need any help, contact *technical support*.

In view of facilitating the processing of your requests, please specify your shop ID (an 8-digit number) in your query.

This information is available in the "registration of your shop" e-mail or in the Merchant Back Office (**Settings** > **Shop** > **Configuration**).