



# Inovio

Hosted Payment Page Technical Guide

Version 2.1

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# 1 Overview

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## 1.1 Overview

Payment Page can be used by merchants to accept payments from their customers using Inovio's Payments gateway service.

The page can be customized and secured to fit the merchant's business needs. The Payment page can handle a membership product, a single purchase product of a pre-set price, or a dynamically priced amount.

## 1.2 Revision History

Version	Date	Description
1.0	4 Aug 2015	First version of document.
1.2	30 Dec 2015	External CSS information.
1.21	01 Apr 2016	Added parameter REQUEST_CURRENCY Added parameter CUST_BRCPFCNPJ
1.3	26 Feb 2021	Added Multi-Language Support (Spanish and Brazilian Portuguese). Added CUST_PHONE and CUST_BIRTHDAY Parameters
1.4	25 Mar 2021	Added an example on passing Form Elements in URL
1.5	8 Apr 2021	Added Boleto payment type Added PGTYPE guidance Added PROC_REFERENCE_NUM and PROC_RETRIEVAL_NUM to pass-through parameter list Clarified Payment Page Links
1.6	03 Oct 2022	Added 3DS 2.x Support
1.7	10 Jan 2023	Added Pix Payment Support
1.8	24 Oct 2023	Corrected URL links to point to Production URL
1.9	08 Jan 2024	Added Merchant Account ID requirement for 3DS 2.0 support
2.0	13 Mar 2024	Added restrictions on 3DS 2.0 iframe
2.1	21 Aug 2025	General document cleanup

## 2 Payment Page Creation

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### 2.1 Payment Page Links

The general format of a link to the hosted payment page is:

[https://api.inoviopay.com/paymentpage/load/\[CLIENT\\_ID\]/\[SITE\\_ID\]](https://api.inoviopay.com/paymentpage/load/[CLIENT_ID]/[SITE_ID])

If you don't know your CLIENT\_ID and SITE\_ID(s), please contact client support.

There are two general options for creating payment page links: Using a pre-configured product with a set price; or using a dynamically created transaction amount.

#### 2.1.1 Using a Pre-Configured Product in the URL

From the gateway portal, create a product with a set price/currency. The product type can be a membership type or any other type with a fixed price, but *NOT* a dynamic price type.

Once the product is created, the hosted payment page is accessed putting the product id (PROD\_ID) onto the end of the base url, eg:

[https://api.inoviopay.com/paymentpage/load/\[CLIENT\\_ID\]/\[SITE\\_ID\]/\[PROD\\_ID\]](https://api.inoviopay.com/paymentpage/load/[CLIENT_ID]/[SITE_ID]/[PROD_ID])

#### 2.1.2 Using a Dynamically Created Transaction Amount

In order to use a dynamically created transaction amount, use the general format of the payment page (i.e. [https://api.inoviopay.com/paymentpage/load/\[CLIENT\\_ID\]/\[SITE\\_ID\]](https://api.inoviopay.com/paymentpage/load/[CLIENT_ID]/[SITE_ID])) and use the methods below for securing the page, which will include parameters for setting a transaction amount.

##### 2.1.2.1 Dynamic one-time payments

Use PROD\_TYPE=6 as described in the next section.

##### 2.1.2.2 Dynamic membership payments

Use PROD\_TYPE=1 or PROD\_TYPE=2 as described in the next section.

### 2.2 Securing the Page Using Hash Validation

In order to provide a more secure Payment Page to customers, merchants must use hash validation using SHA-1 algorithm and store that hash in the OFFER\_KEY parameter. This ensures that sensitive payment fields cannot be tampered with for fraud.

As an added security, merchants should post parameter called OFFER\_TTL; this allows the merchant to set an expiration date for the OFFER\_KEY parameter.

#### 2.2.1 Auto-generating Products and Hash Parameters

The table below includes the required parameters for creating your Payment Page link with product auto-generation and hash.

The product you want to auto-generate will be automatically matched to an existing product if a product with the same properties already exists. Products are unique per website (SITE\_ID).

The Payment Page will display “No product ID specified” error if there is an issue with the parameters sent.

Field Name	Description	Type
CLIENT_ID	Client Identifier	Numeric
SITE_ID	Site Identifier	Numeric
OFFER_DESC	Product Description (this will be displayed on the Payment Page)	Alphanumeric (128 char.)
OFFER_NAME	Product Name	Alphanumeric (64 char.)
OFFER_AMOUNT	Product Amount/Price	Number (10,2)
REBILL_METRIC	Rebill Metric Type	Set this parameter: D – Day M – Month Y – Year
REBILL_PERIOD	Rebill Period	Number (3)
PROD_TYPE	Product type: renewing or non-renewing membership, or one-time purchase product	Set this parameter to: 1 – Non-renewing membership 2 – Renewing membership 6 – One-time purchase (non-membership)
OFFER_TTL	Page “time to live”. The date and time should be set in the future. The page will “expire” if TTL set is in the past.	Date (DDMMYYYYHH24MISS)  <b>The time zone should be in UTC.</b>
OFFER_VAR	Salt – this should be a randomly generated 2 alphanumeric characters for each time you generate a link.	Varchar (2 char.)
OFFER_KEY	This field should contain the hash.	
MERCH_ACCT_ID	Merchant Account ID	Numeric

## 2.2.2 Creating the OFFER\_KEY Parameter for the Payment Page Link

We will provide the merchant a *shared key* for creating the hash value for the OFFER\_KEY parameter. Merchants must generate the hash using SHA-1 algorithm. The field values of the following parameters should be included in the hash and set in the OFFER\_KEY parameter:

**NOTE: The field values need to follow this order.**

OFFER\_KEY: SHA1(CONCATENATED(OFFER\_AMOUNT, OFFER\_NAME, REBILL\_METRIC, REBILL\_PERIOD, OFFER\_TTL, OFFER\_VAR, SHAREDKEY))

### 2.2.2.1 Example Payment Page Link for a standalone transaction

#### 2.2.2.1.1 Example Payment Page URL (one-time purchase product):

[https://api.inoviopay.com/paymentpage/load/\\$CLIENT\\_ID/\\$SITE\\_ID?OFFER\\_AMOUNT=99.9&OFFER\\_NAME=onetime&REBILL\\_METRIC=D&REBILL\\_PERIOD=1&OFFER\\_TTL=04082015130058&OFFER\\_VAR=YZ&OFFER\\_DESC=&PROD\\_TYPE=6&OFFER\\_KEY=9CC68ED9073C3C5AF5DBF1F2431F83A072ECC123](https://api.inoviopay.com/paymentpage/load/$CLIENT_ID/$SITE_ID?OFFER_AMOUNT=99.9&OFFER_NAME=onetime&REBILL_METRIC=D&REBILL_PERIOD=1&OFFER_TTL=04082015130058&OFFER_VAR=YZ&OFFER_DESC=&PROD_TYPE=6&OFFER_KEY=9CC68ED9073C3C5AF5DBF1F2431F83A072ECC123)

### 2.2.2.2 Example Payment Page Links for Subscriptions

#### 2.2.2.2.1 Example Payment Page URL (monthly renewing subscription at 10.99):

[https://api.inoviopay.com/paymentpage/load/\\$CLIENT\\_ID/\\$SITE\\_ID?OFFER\\_AMOUNT=10.9&OFFER\\_NAME=monthly%20sub&REBILL\\_METRIC=M&REBILL\\_PERIOD=1&OFFER\\_TTL=04082015130058&OFFER\\_VAR=YZ&OFFER\\_DESC=Monthly%20Subscription&PROD\\_TYPE=2&OFFER\\_KEY=9CC68ED9073C3C5AF5DBF1F2431F83A072ECC09D](https://api.inoviopay.com/paymentpage/load/$CLIENT_ID/$SITE_ID?OFFER_AMOUNT=10.9&OFFER_NAME=monthly%20sub&REBILL_METRIC=M&REBILL_PERIOD=1&OFFER_TTL=04082015130058&OFFER_VAR=YZ&OFFER_DESC=Monthly%20Subscription&PROD_TYPE=2&OFFER_KEY=9CC68ED9073C3C5AF5DBF1F2431F83A072ECC09D)

#### 2.2.2.2.2 Example Payment Page URL (non-renewing subscription cancels after 1 month at 12.99):

[https://api.inoviopay.com/paymentpage/load/\\$CLIENT\\_ID/\\$SITE\\_ID?OFFER\\_AMOUNT=12.9&OFFER\\_NAME=monthly%20sub&REBILL\\_METRIC=M&REBILL\\_PERIOD=1&OFFER\\_TTL=04082015130058&OFFER\\_VAR=YZ&OFFER\\_DESC=Monthly%20Subscription&PROD\\_TYPE=1&OFFER\\_KEY=9CC68ED9073C3C5AF5DBF1F2431F83A072ECC456](https://api.inoviopay.com/paymentpage/load/$CLIENT_ID/$SITE_ID?OFFER_AMOUNT=12.9&OFFER_NAME=monthly%20sub&REBILL_METRIC=M&REBILL_PERIOD=1&OFFER_TTL=04082015130058&OFFER_VAR=YZ&OFFER_DESC=Monthly%20Subscription&PROD_TYPE=1&OFFER_KEY=9CC68ED9073C3C5AF5DBF1F2431F83A072ECC456)

### 2.2.2.3 Example Payment Page Links for Subscriptions

[https://api.inoviopay.com/paymentpage/load/\\$CLIENT\\_ID/\\$SITE\\_ID/\\$PROD\\_ID](https://api.inoviopay.com/paymentpage/load/$CLIENT_ID/$SITE_ID/$PROD_ID)

**NOTE: The URI string must be URL-encoded.**

## 2.2.3 Sample Code to Generate OFFER\_KEY

### 2.2.3.1 PHP

```
<?php

hash=sha1 ("$OFFER_AMOUNT$OFFER_NAME$REBILL_METRIC$REBILL_PERIOD$OFFER_TTL
$OFFER_VAR$SHAREDKEY") ;

?>
```

### 2.2.3.2 JAVA

```
import org.apache.commons.codec.binary.Hex;
import java.io.UnsupportedEncodingException;
import java.security.MessageDigest;
import java.security.NoSuchAlgorithmException;

public class SHA1Example {
    public static void main(String[] args) throws
    NoSuchAlgorithmException, UnsupportedEncodingException {
        String offerAmount = "10.99";
        String offerName = "monthly sub";
        String rebillMetric = "M";
        String rebillPeriod = "1";
        String offerttl = "10082015161313";
```

```

        String offerVar = "G4";
        String sharedKey = "r5ndomNumb!ers011";

        String hash = generateHash(offerAmount, offerName, rebillMetric,
        rebillPeriod, offerTtl, offerVar, sharedKey);

        System.out.println("Hash value: " + hash);
    }

    private static String generateHash(String offerAmount, String
    offerName, String rebillMetric, String rebillPeriod, String
    offerTtl, String offerVar, String sharedKey) throws
    NoSuchAlgorithmException, UnsupportedEncodingException {
        String textToBeHashed = offerAmount + offerName + rebillMetric +
        rebillPeriod + offerTtl + offerVar + sharedKey;

        MessageDigest md = MessageDigest.getInstance("SHA-1");
        byte[] hashBytes = md.digest(textToBeHashed.getBytes("UTF-8"));
        return Hex.encodeHexString(hashBytes).toUpperCase();
    }
}

```

## 2.2.4 Other URL Parameters

These parameters can also be passed to the Payment Page URL. Please note, when passed in, form elements will NOT be visible. example

[https://api.inovio.com/paymentpage/load/114111/106000/154000?cu\\_st\\_fname=test](https://api.inovio.com/paymentpage/load/114111/106000/154000?cu_st_fname=test)

By default ALL POSSIBLE fields on a hosted page are enabled, to customize your page with specific fields, send a ticket to our client support with the names of the fields you'd like disabled.

Field Name	Description
CUST_FNAME	Customer First Name
CUST_LNAME	Customer Last Name
CUST_EMAIL	Email Address
CUST_BRCPFCNPJ	Identification number, Brazilian customers.
CUST_PHONE	Customer Phone number
CUST_BIRTHDAY	Customer Date of Birth
XTL_CUST_ID	External Customer ID
BILL_ADDR	Billing Street Address
BILL_ADDR_CITY	Billing City
BILL_ADDR_STATE	Billing 2-letter State Code
BILL_ADDR_ZIP	Billing ZIP or Postal Code
BILL_ADDR_COUNTRY	Billing 2-letter Country Code
XTL_ORDER_ID	External Order ID
XTL_UDF01	User-defined field 1
XTL_UDF02	User-defined field 2
PGCSS	CSS Location (Contact Client Services before using this field) See Section 3 for more information.

PG_REDIR	Set to “1” to redirect the user to an external page after purchase attempt. <i>Both</i> success and decline URL’s must have values if this is used.
PG_SUCC_URL	URL of where user will be redirected to after a successful purchase
PG_DEC_URL	URL of where user will be redirected to after a failed purchase
REQUEST_CURRENCY	Currency type to be charged in 3-letter code format. Will not work if merchant account does not support it.

## 2.2.5 Pass-through Parameters in the Redirect URL

The fields in the table below will be appended to PG\_SUCC\_URL or PG\_DEC\_URL (Redirect URLs) if PG\_REDIR is set to 1.

Field Name	Description
PO_ID	Order ID NOTE: Service Declines will not return an Order ID.
PROC_REFERENCE_NUM	Transaction reference data from the merchant’s acquirer
PROC_RETREIVAL_NUM	Transaction identifier from the merchant’s acquirer
TRANS_ID	Transaction ID NOTE: Service Declines will not return a Transaction ID.
TRANS_STATUS_NAME	Transaction Status Name NOTE: Certain API Declines like missing merchant account or invalid parameter will not return a Transaction Status Name. This should be considered as a failed transaction attempt. Check appendix section for different transaction status types.
XTL_ORDER_ID	External Order ID
XTL_UDF01	user-defined field 1
XTL_UDF02	user-defined field 2

## 3 Application of Custom CSS

Merchants wanting to offer a branded and more thematic purchase page design may wish to apply their own CSS. This is supported through the PGSS parameter. Its value is that of the entire URL of the CSS file. For example:

<https://api.inovio.com/paymentpage/load/1111/11111/11111?pgcss=https://yoursite.net/yourfile.css>

Don’t forget to urlencode this parameter.

**!** Most browsers, particularly recent versions, will block non-secure elements when there is mixed content of secure and insecure types on the page. We recommend that when invoking an external stylesheet, it comes from a secure (**https://**) protocol prefix as opposed to insecure (**http://**). A secure certificate is required in order to use https; contact your hosting provider for more information.

## 4 Multi-Language Support

Inovio's Hosted Payment Page currently supports the following languages based on the detected browser/user-agent language preference.

- Spanish
- Brazilian Portuguese

## 5 Changing the payment page format

As an advanced option, a different form of payment page can be loaded using the PGTYPE parameter, as described below:

Field Name	Description
PGTYPE	[omitted] - This is the standard credit card form page using all available form fields. 1 – This is a minimized credit card form page using only the minimum fields needed. This is suitable for use in an iframe. 2 – This is the standard Boleto form page using all available form fields. 11 – This is the standard ACH form page using all available form fields. 8 – This is the standard PIX Payment page using all available form fields

## 6 BOLETO

Boleto (boleto bancário) is a type of payment which is supported only in Brazil. It is a ticket, or printable form, which facilitates offline payment.

In the case of the hosted payment form, this will initiate the creation of the boleto. Once the form is successfully submitted, the user will be redirect to a URL which yields the boleto itself (usually in a PDF format), which the customer must then print and submit with payment at a qualifying location.

Note that this means the hosted payment form for boleto does not mean that the merchant will get paid! The customer must complete the payment offline. In order for the merchant to be notified that payment is completed, the merchant should integrate the Postback Service from the gateway. Contact client support for more information and documentation of the Postback Service.

This is an example of the default boleto ticket layout defined by FEBRABAN (Brazilian Federation of Banks):

 <b>Bradesco</b>   <b>237-2</b>		<b>23791.11103 60000.000103 01000.222206 1 48622000000000</b>				
Local de pagamento <b>PAGÁVEL PREFERENCIALMENTE NAS AGÊNCIAS DO BRADESCO</b>						Vencimento <b>29/01/2011</b>
Cedente <b>NF-e Associacao NF-e</b>						Agência / Código cedente <b>1111-8/0002222-5</b>
Data do documento <b>25/01/2011</b>	No documento <b>NF 1 1/1</b>	Espécie doc.	Aceite <b>N</b>	Data processamento <b>25/01/2011</b>	Carteira / Nossa número <b>06/00000001001-6</b>	
Uso do banco	Carteira <b>06</b>	Espécie <b>R\$</b>	Quantidade	(x) Valor	(±) Valor documento <b>R\$ 20,000,000.00</b>	
Instruções (Texto de responsabilidade do cedente) <b>Não receber após o vencimento.</b> <b>Boleto 1 de 1 referente a NF 1 de 06/05/2008 com chave 3508-0599-9990-9091-0270-5500-1000-0000-0151-8005-1273</b>						(±) Desconto / Abatimentos (±) Outras deduções (±) Mora / Multa (±) Outros acréscimos (±) Valor cobrado
Sacado <b>DISTRIBUIDORA DE AGUAS MINERAIS CNPJ: 00.000.000/0001-91</b> <b>AV DAS FONTES 1777 10 ANDAR</b> <b>PARQUE FONTES - Sao Paulo/SP - CEP: 13950-000</b>						Cód. baixa
Sacador / Avalista						Autenticação mecânica - <b>Ficha de Compensação</b>
						

## 6.1 Boleto Hosted Payment Page Processing

Boleto Payment type can be processed through Inovio's Hosted Payment Page. In order to invoke Boleto support within the Payment Page, the following additional parameter will need to be added to the payment page URL.

Name	Description
PGTYPE	<b>Required. Assign "2" to invoke Boleto support.</b>

A full URL of the hosted page which uses Boleto, uses Brazilian currency, and contains conditional redirect URL's would look similar to this:

[https://api.inovio.com/paymentpage/load/11114/23000/32000?pgtype=2&PG\\_REDIR=1&PG\\_SUCC\\_URL=http://www.testing.net/hosted/gen\\_redir.php&PG\\_DEC\\_URL=http://www.testing.net/hosted/gen\\_redir](https://api.inovio.com/paymentpage/load/11114/23000/32000?pgtype=2&PG_REDIR=1&PG_SUCC_URL=http://www.testing.net/hosted/gen_redir.php&PG_DEC_URL=http://www.testing.net/hosted/gen_redir)

Additional Pass-through Parameters in the Redirect URL for Boleto

The fields in the table below will be appended to PG\_SUCC\_URL only (not PG\_DECL\_URL) (Redirect URLs) if PG\_REDIR is set to 1.

Field Name	Description
PROC_BARCODE	Numeric representation of the boleto bar code
PROC_REDIRECT_URL	Unique URL of the boleto digital form (usually a PDF) The merchant should either redirect the user to this URL from the PG_SUCC_URL or provide the user with a link to this URL on the PG_SUCC_URL
PROC_REFERENCE_NUM	Internal reference data from the merchant's bank
PROC_RETRIEVAL_NUM	Numeric representation of the boleto bar code (this field is deprecated, but still provided for backwards compatibility)

## 7 3DS 2.x Support

3D Secure (3DS) provides an extra fraud protection layer for customers and merchants on a Card Not Present environment. Where necessary, 3D Secure (3DS) may require customers to complete an additional verification step with the card issuer when paying online. Typically, customers are redirected to an authentication page on their bank's website, and they enter a password associated with the card or a code sent to their phone.

Inovio's hosted payment checkout page supports 3DS authentication process. To enable 3DS on the checkout page, simply submit a payment request url with "*request\_enrollment*"=1.

**! Note:** Merchant Account Id is required for 3DS 2.x Support on hosted payment page.

### 7.1 Example Payment Page URL with 3DS 2.x

```
https://api.inovio.com/paymentpage/3ds2/15904/23803/32806?merch acc
t id=123403&bill addr city=HereTown&bill addr state=CA&bill addr=123St
reet&cust fname=Mister&cust lname=Testface&bill addr zip=99887&bill ad
dr country=US&cust email=mister@testface.dev&request enrollment=1
```

## 8 Pix Payment

Pix is an instant payment platform created and managed by the Central Bank of Brazil (BCB) and only used in Brazil. Pix enables its users — individuals, companies and governmental entities — to send or receive payment transfers in a few seconds at any time, including non-business days. Pix Payment is made by scanning a QR Code with a smart phone which redirects the customer to their bank portal in order to make an instant payment. Payment can also be made by Pix Copy and Paste which copies the QR Code number

Pix Payment type can be processed through our Hosted Payment Page during the checkout process. In order to invoke Pix support within the Payment Page, the following parameter will need to be added to the payment page URL.

Name	Description
PGTYPE	<b>Required. Assign “8” to invoke Pix support.</b>

The fields in the table below will be appended to PG\_SUCC\_URL only (not PG\_DECL\_URL) (Redirect URLs) if PG\_REDIR is set to 1.

Field Name	Description
PROC_REDIRECT_URL	Unique URL of the Pix QR Code which should display the QR for customer to scan. The merchant should either redirect the user to this URL from the PG_SUCC_URL or provide the user with a link to this URL on the PG_SUCC_URL
PROC_REFERENCE_NUM	Internal reference data from the merchant's bank (Pix Token)
PROC_RETRIEVAL_NUM	Order ID

## 8.1 Example Pix Payment URL

[https://api.inovio.com/paymentpage/load/88704/100103/116005?pgtype=8&request\\_currency=BRL&CUST\\_BRCPFCNPJ=42424242488&cust\\_fname=Mister&cust\\_lname=Pixface&cust\\_email=test@example.com&cust\\_ssn\\_14=8888&bill\\_addr=123+Some+Street&cust\\_phone=9494949499&cust\\_birthday=&cust\\_login=userID4987&cust\\_password=pass001654&bill\\_addr\\_city=HereTown&bill\\_addr\\_zip=01418102&bill\\_addr\\_state=CA&bill\\_addr\\_country=BR&bill\\_addr\\_district=test&merch\\_acct\\_id=1235317](https://api.inovio.com/paymentpage/load/88704/100103/116005?pgtype=8&request_currency=BRL&CUST_BRCPFCNPJ=42424242488&cust_fname=Mister&cust_lname=Pixface&cust_email=test@example.com&cust_ssn_14=8888&bill_addr=123+Some+Street&cust_phone=9494949499&cust_birthday=&cust_login=userID4987&cust_password=pass001654&bill_addr_city=HereTown&bill_addr_zip=01418102&bill_addr_state=CA&bill_addr_country=BR&bill_addr_district=test&merch_acct_id=1235317)

## APPENDIX A: Transaction Status

TRANS_STATUS_NAME	Description
APPROVED	Transaction has been approved.
DECLINED	Transaction has been declined.
PENDING	Transaction is in pending status (expected on Preauthorization of online check transactions (i.e. EU Debit, ACH, etc.)).
RUNNING	Transaction processing is not completed or is waiting completion.
FAILED	Transaction did not finish payment completion (used in European Direct Debit transactions)