



## Scanning Tool - For iTero Generic API Integrations

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## 1 Revision History

Revision Number	Revision Date	Nature of Revision
1	03 Sep 2023	Initial
2	06 Mar 2024	Fixes

## 2 What is Scanning Tool

A scanning tool is a set of APIs that allows 3rd parties integrating with iTero to create scans for development purposes.

The tool is available on iTero Staging environment (Sandbox) only.

## 3 The Benefits of the Tool

We keep working to make the integration for 3rd parties with iTero easier and faster. Creating cases during development is essential for development. This tool expedites and simplifies the process.

The tool replaces the need of a 3rd party to assign a scanner for development or to install an emulator on a local machine.

The benefits of the service:

1. Self-served
2. Does not require any installation on the 3rd party side for the development of the integration
3. Does not require allocating a scanner for the development of the integration
4. Maintained by iTero
5. Saves time for the developer that does not really need to scan

## 4 Contacting Support

Please contact iTero Support at [iTeroAPISupport@aligntech.com](mailto:iTeroAPISupport@aligntech.com) for any related issues.



## 5 How to use

All endpoints are using the same base URL

{baseUrl}: <https://mate-for-partners-us-west-1-sandbox.dv.itero.cloud>

The scanning tool provides 3 endpoints:

Name	Description	Type	Endpoint	Authentication
Send a case	Create and send a new case with a new RX	POST	<a href="{baseUrl}/api/v1/order/create-new-order">/api/v1/order/create-new-order</a>	Basic Auth
Send a case using RXID	Create and send a new case based on an existing RX	POST	<a href="{baseUrl}/api/v1/order/create-new-order-by-rx">/api/v1/order/create-new-order-by-rx</a>	Basic Auth
Get Map ID	Get available Map IDs	GET	<a href="{baseUrl}/api/v1/presets/available-procedure-maps">/api/v1/presets/available-procedure-maps</a>	None

### 5.1 Returned Codes

APIs returned codes are described below:

HTTP Status Code	Description	Scenario
200	OK	/
400	Bad request	One of the parameters is not valid
401	Unauthorized error	<ol style="list-style-type: none"> <li>Wrong user or password</li> <li>Miss credentials</li> </ol>
500	Internal Server error	/

### 5.2 Send a case

Send a POST call to create a new scan.

[/api/v1/order/create-new-order]({baseUrl}/api/v1/order/create-new-order)

#### Header

Authorization: Basic auth requires a doctor user and password that were provided by the Professional Services engineer supporting your project.

#### Request Body

Body includes RX information and scan procedure and type:



```

{
  "companyId": number,
  "scannerSerialNumber": string,
  "procedureMapId": number,
  "patient": {
    "firstName": string,
    "lastName": string,
    "chartNumber": string,
    "mi": string,
    "gender": number,
    "dateOfBirth": date,
    "zipCode": string,
  },
  "notes": string,
  "labId": number
}

```

The table below describes the fields that are passed in the request body:

Tag Name		Type	Description	Is Mandatory
companyId		number	iTero ID of the doctor's clinic	Yes
scannerSerialNumber		string	Scanner serial number of the specified clinic	Yes
procedureMapId		number	ID of the procedure. Refer to 'Get Available Procedure Maps'	Yes
patient			<a href="#">Patient's information</a>	
	firstName	string	Patient's first name	Yes
	lastName	string	Patient's last name	Yes
	chartNumber	string	Patient's chart number	No
	mi	string	Patient middle name	No
	gender	number	0 - male 1 - female	Yes
	dateOfBirth	date	<a href="#">Patient's data of birth.</a> Format is YYYY-MM-DDTHH:MM:ss.SSSZ or YYYY-MM-DD	Yes
	zipCode	string	<a href="#">Patient's zip code</a>	No
notes		string	Any free text that the scanning doctor wants to add to the RX.	No



Tag Name		Type	Description	Is Mandatory
labId		number	iTero ID of the lab that the scan is sent to.  This parameter is based on the Procedure Map ID. Map IDs that have a lab require an ID in this field.  Pass null if lab is not required.	Depends

### 5.2.1 Response

Upon success of the call the API returns the following:

```
{
  "orderId": number,
  "orderCode": string,
  "patientGuid": GUID,
  "rxGuid": GUID (RXID)
}
```

The table below describes the information returned by the call:

Tag Name	Type	Description
orderId	number	A unique number assigned to the scan. This number will be used for downloading the scan's assets.
orderCode	string	A unique string assigned to the scan. This information is not required to be used by other endpoints.
patientGuid	GUID	A unique identifier of the patient
rxGuid	GUID	A unique identifier of the RX

## 5.3 Send a case using RXID

Send a POST call to create a case using an existing RX.

This purpose of this endpoint is to create a scan following a "Scan Request". "Scan Request" call creates an RX that is sent to the scanner. The call returns an RXID that should be passed in this call.

<http://{{baseUrl}}/api/v1/order/create-new-order-by-rx>

### 5.3.1 Header

Authorization: Basic auth requires a doctor user and password that were provided by the Professional Services engineer supporting your project.

### 5.3.2 Request Body

Body includes RX information and scan procedure and type:



```
{
  "companyId": number,
  "scannerSerialNumber": string,
  "rxId": GUID (RXID),
  "procedureMapId": number,
  "labId": number
}
```

The table below describes the fields that are passed in the request body:

Fields Name	Type	Description	Is Mandatory
companyId	number	iTero ID of the doctor's clinic	Yes
scannerSerialNumber	string	Scanner serial number of the specified clinic	Yes
rxId	GUID	GUID of an existing RX	Yes
procedureMapId	number	ID of the procedure. Refer to 'Get Available Procedure Maps'	Yes
labId	number	iTero ID of the lab that the scan is sent to.  This parameter is based on the Procedure Map ID. Map IDs that have a lab require an ID in this field.  Pass null if lab is not required.	Depends

### 5.3.3 response

Upon success of the call the API returns the following:

```
{
  "orderId": number,
  "orderCode": string,
  "patientGuid": GUID,
  "rxGuid": GUID (RXID)
}
```

The table below describes the information returned by the call:

Tag Name	Type	Description
orderId	number	A unique number assigned to the case. This number will be used for downloading the scan's assets.
orderCode	string	A unique string assigned to the case. This information is not required to be used by other endpoints.
patientGuid	GUID	A unique identifier of the patient



Tag Name	Type	Description
rxGuid	GUID	A unique identifier of the RX

## 5.4 Get Available Procedure Maps

Send a GET call to get the available Map IDs

[/api/v1/presets/available-procedure-maps]({baseUrl}/api/v1/presets/available-procedure-maps)

### 5.4.1 What is MapID

Each iTero case must use one of six procedures, a type (that is applicable to some of the procedures) and lab to send the case to (if applicable). Please refer to the Appendix for a list of procedures and types.

The combination of these three parameters is part of every iTero RX, and has a unique number. This number is passed when creating a case using iTero new API.

In order to know which number to pass, use the Get Available Map IDs endpoint and select one that is relevant to your flow.

Below are some common examples

Procedure	Type	Send To	Map ID
Study Model - iRecord	NA	Ortho lab	1
Invisalign	Invisalign First Aligners	NA	4
Fixed Restorative	NA	Resto lab	30
Appliance	NA	Ortho lab	41
Denture/Removable	Partial Denture/Framework	<a href="https://myitero.com">Myitero.com</a>	83
Implant Planning	Surgical guide Tooth supported	<a href="https://myitero.com">Myitero.com</a>	85

### 5.4.2 Header

No authorization is required for this call

### 5.4.3 Request Body

No body is passed.

### 5.4.4 Response

Upon success of the call the API returns the following:



```

{
  "procedureMaps": [
    {
      "procedureMapId": number,
      "description": string,
      "note": string,
      "caseType": string,
      "procedure": string,
      "type": string,
      "sendTo": string
    },
    ....
  ]
}

```

The table below describes the information returned by the call:

Tag Name	Type	Description
procedureMapId	number	ID of the trio: Procedure, type and send To
description	string	Description of the procedure
note	string	How to use this Map ID
caseType	string	For backwards compatibility, if account is does not support procedures, pass the mapped case type
procedure	string	One of 6 available procedures, Check the appendix
type	string	Procedure type if applicable. Check the appendix
sendTo	string	Type of lab to send to. Check the appendix.

## 6 Limitations

- Caller can create up to 10 cases per minute using the API
- No clinical information can be passed

## 7 Appendix

### 7.1 Procedures and Types

ID	Procedure Name	Type Name
1	Study Model - iRecord	
		Ortho Model/iCast
2	Invisalign	
		Invisalign Aligners



ID	Procedure Name	Type Name
		Invisalign First Aligners
		Invisalign First Palatal Expander
		Vivera Retainer
		Invisalign Retainer
3	Implant Planning	
		Surgical guide Tooth supported
		Surgical guide Tissue Supported
		Surgical guide Bone supported
4	Fixed Restorative	
5	Denture/Removable	
		Partial Denture/Framework
		Immediate Denture
		Full Denture Tissue Based
		Full Denture Implant Based
6	Appliance	
		Night guard
		Bite Splint
		Sports/Mouth guard
		Apnea/Sleep Appliance
		Clear aligners
		Ortho Appliance

## 7.2 Send To options

Send To	Description	
<a href="#">restoLab</a>	Case should be sent to a resto lab	Caller should provide an account number of a resto lab (LabId) that is related to the clinic account
<a href="#">orthoLab</a>	Case should be sent to an ortho lab	Caller should provide an account number of an ortho lab (LabId) that is related to the clinic account



Send To	Description	
<a href="#">chairside</a>	Case is sent to chair side	Caller should pass null in LabId
<a href="#">midc_only</a>	Case is sent to <a href="http://myitero.com">myitero.com</a>	Caller should pass null in LabId
N/A	No lab is involved	Caller should pass null in LabId