

Creation of external apps

A collection of guides to create apps in external systems (ex: Azure, Zapier...) to be used with vtenext

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 - [OIDC \(OpenID Connect\)](#)
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Zapier

Guide to create a new Zapier integration and examples

Zapier

Introduction

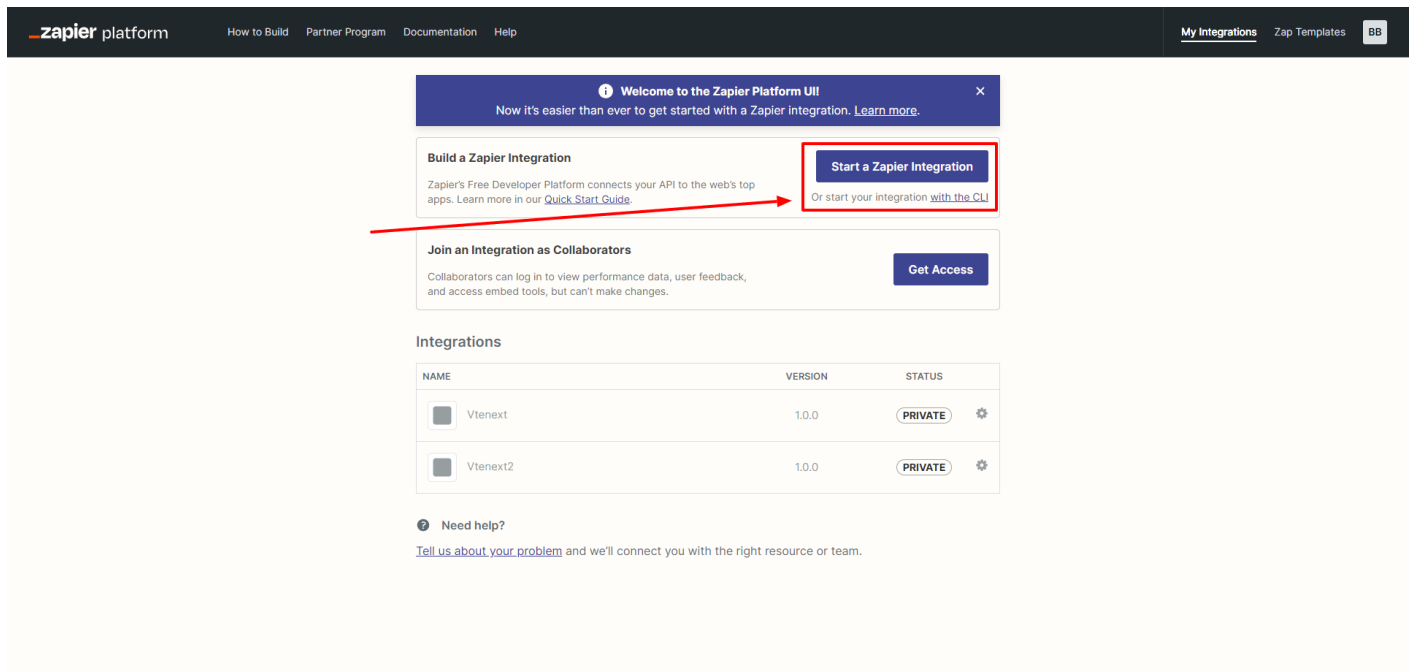
Zapier is a product that allows end-users to integrate web applications and automate workflows. It enables the connection of various web applications through "ZAPs," which can be customized based on user needs. Zapier functions as a bridge between different applications, allowing the automation of business processes and saving valuable time.

The purpose of this tutorial is to configure the integration with vtenext in Zapier and afterwards 2 examples will be shown.

New integration

Hot to create an integration with vtenext in Zapier

1. The first step is to go to <https://developer.zapier.com/>, log in with your Zapier credentials, and click on "Start a Zapier Integration".



2. It is then necessary to fill in all the fields that the Zapier screen requests.

Example:

Name: vtenext

Description: Integrate vtenext with Zapier

Audience: Private

Role: I have no affiliation with...

Category: CRM

Create Integration

Name (required)
The name of your app as it should display in Zapier.

Description (required)
A sentence describing your app in 140 characters or less, e.g. "Trello is a team collaboration tool to organize tasks and keep projects on track." [Learn more.](#)

Homepage URL (optional)
The homepage URL of your app. This will also be used as the email domain that would allow team members to join your integration as a Collaborator. [Learn more.](#)

Logo (optional)
Upload a square, 256x256px or larger transparent PNG image that does not include the app name. [Learn more.](#)
Drop image here or [select image](#)

Intended Audience (required)
Are you building a public or private integration? Public integration development receives priority support and launch promotion from the Zapier team.

Role (required)
What is your relationship with the app you're integrating with Zapier?

If you do not have an official relationship with the owner of this API, Zapier cannot publish the app in its public directory. You may still create an integration for your own organization's use. See our [Developer Platform Agreement](#) for more detail.

Category (required)
How would you categorize your app? Choose the most appropriate option for your app's core features.

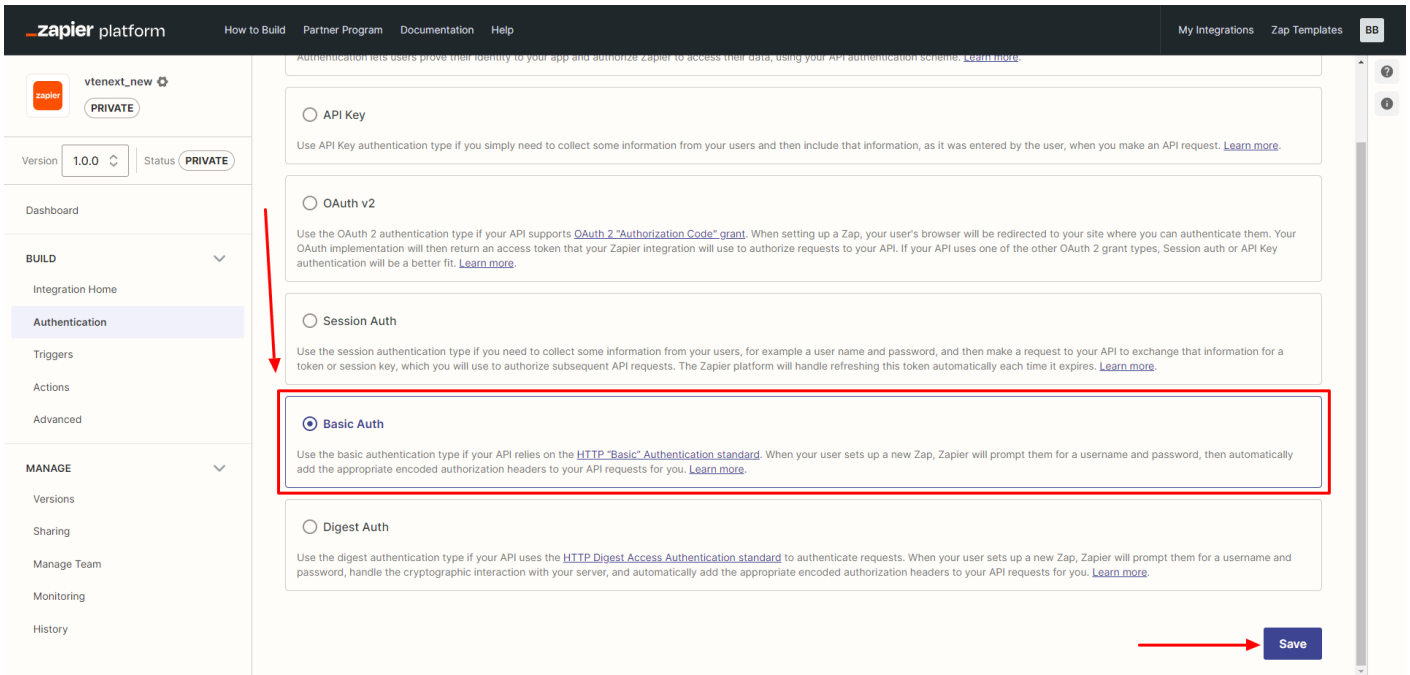
Subscribe to Updates about your integration (optional)
 Get tips and recommendations about this integration along with our monthly newsletter that details the performance of your integration and the latest Zapier news.

3. After a successful save message and successful creation, you will be able to configure the type of authentication.

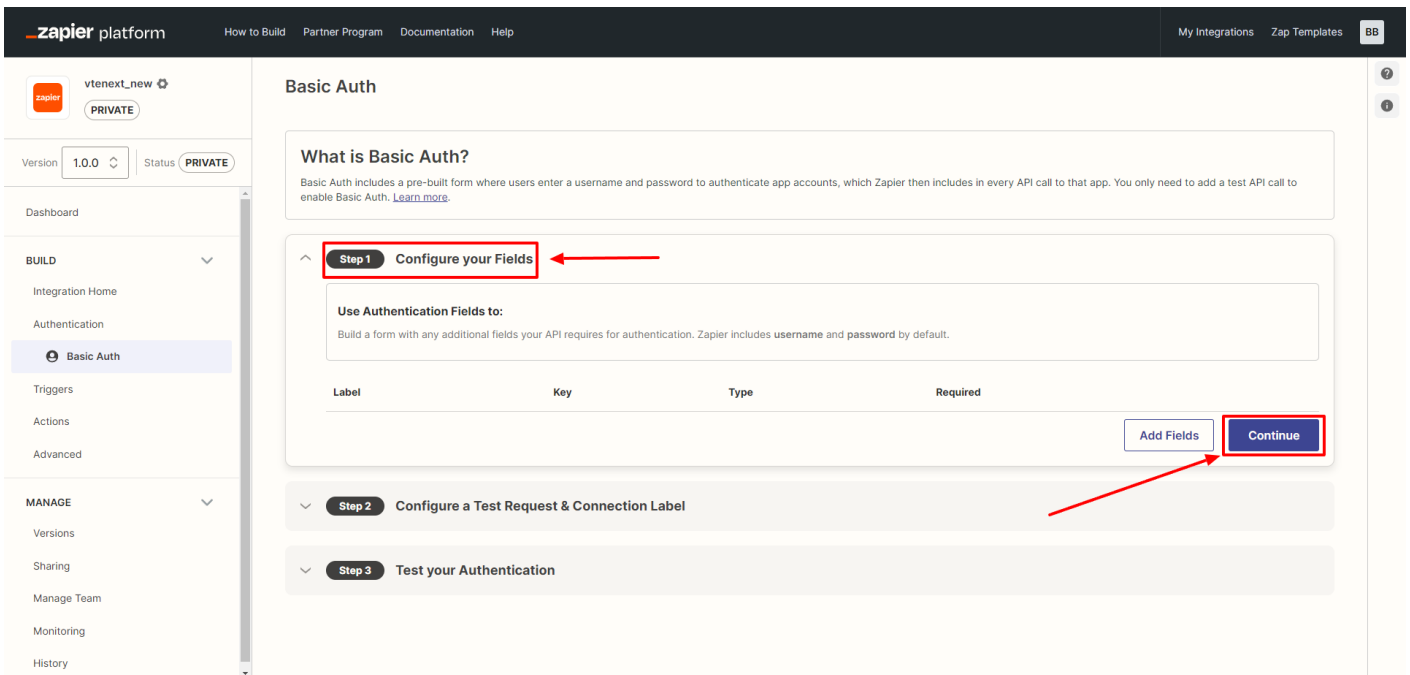
The screenshot shows the 'Integration Home' page for a private integration named 'vtenext_new'. The status is 'PRIVATE'. The page contains a list of configuration steps:

- 1 Authentication**: Tell us how to authenticate users with your API. OAuth 2 is most common, but Zapier also supports a handful of options. [Learn more.](#) A red arrow points to a blue button labeled 'Set Up Authentication'.
- 2 Triggers**: Help users find new data as soon as it's available in your app. Triggers connect to webhooks or polling endpoints. [Learn more.](#)
- 3 Actions**: Help users write data back to your integration. Actions create or update records through your API. [Learn more.](#)
- 4 Validate Integration**: Run automated checks to identify errors in your integration. We provide user experience recommendations to help you improve your integration. [Learn more.](#)
- 5 Share**: Invite your team or users to automate their workflows using your integration via a link or email.

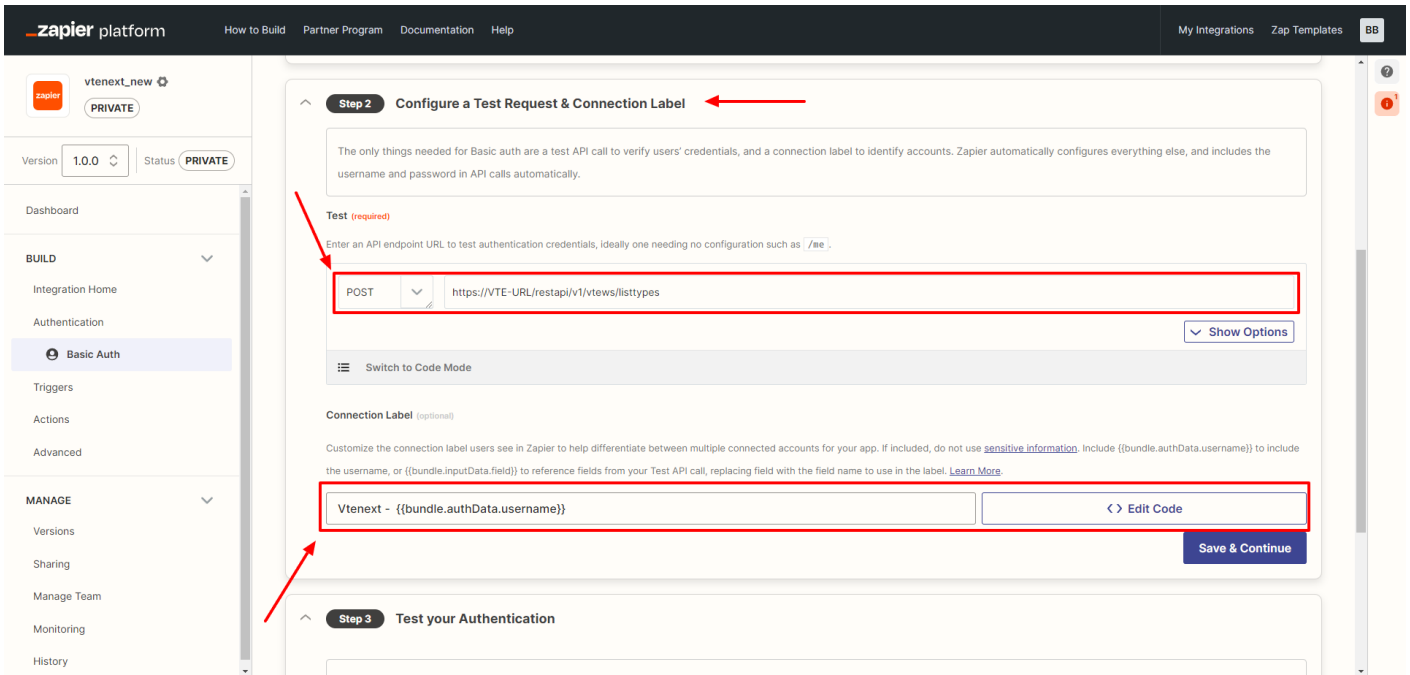
You should select BASIC AUTH and then click on SAVE accordingly.



STEP 1: Leave it blank and click on CONTINUE.

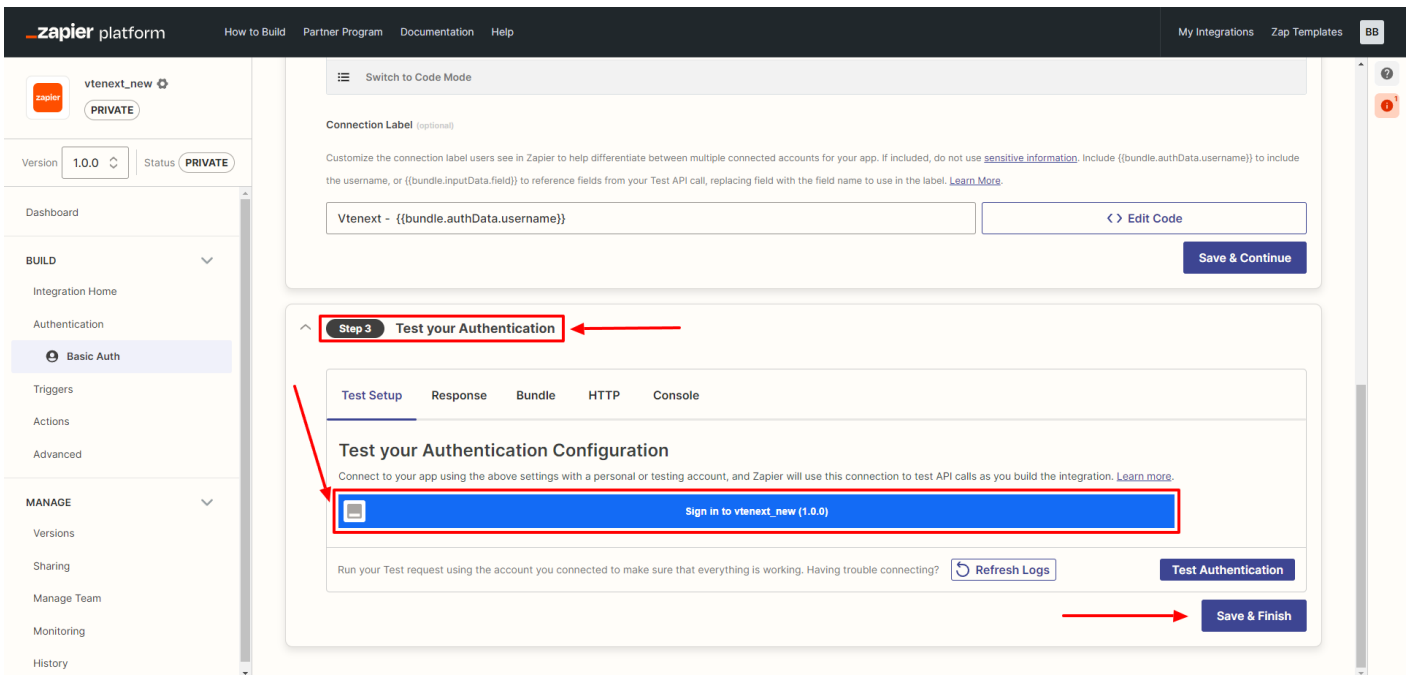


STEP 2: Enter in the test, the POST method, and configure the URL with the following string: <https://VTE-URL/restapi/v1/vtews/listtypes> (where VTE-URL is the absolute address of your vtenext installation).



STEP 3: It's time to test the authentication by clicking on the blue "Sign In" button and finally clicking on **SAVE & FINISH**.

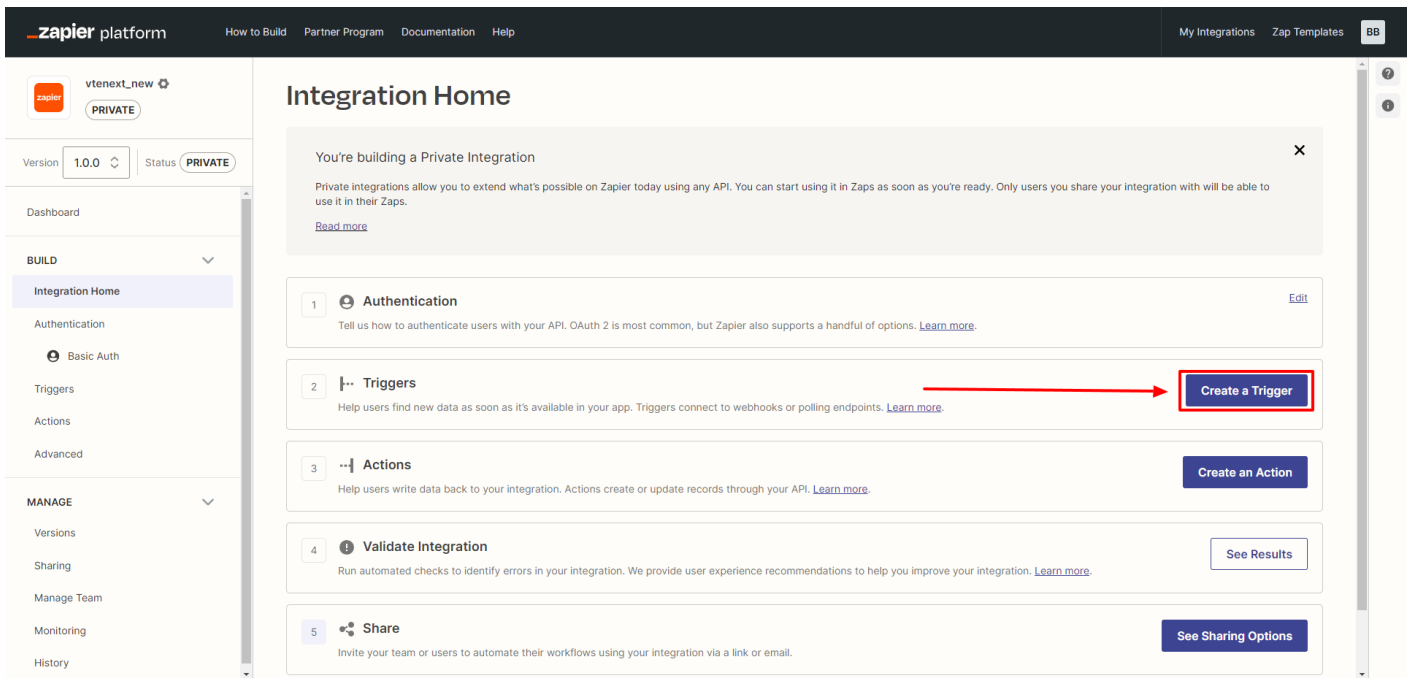
CAUTION: The password to use is the access key of the vtenext user, which can be found in the user's preferences.



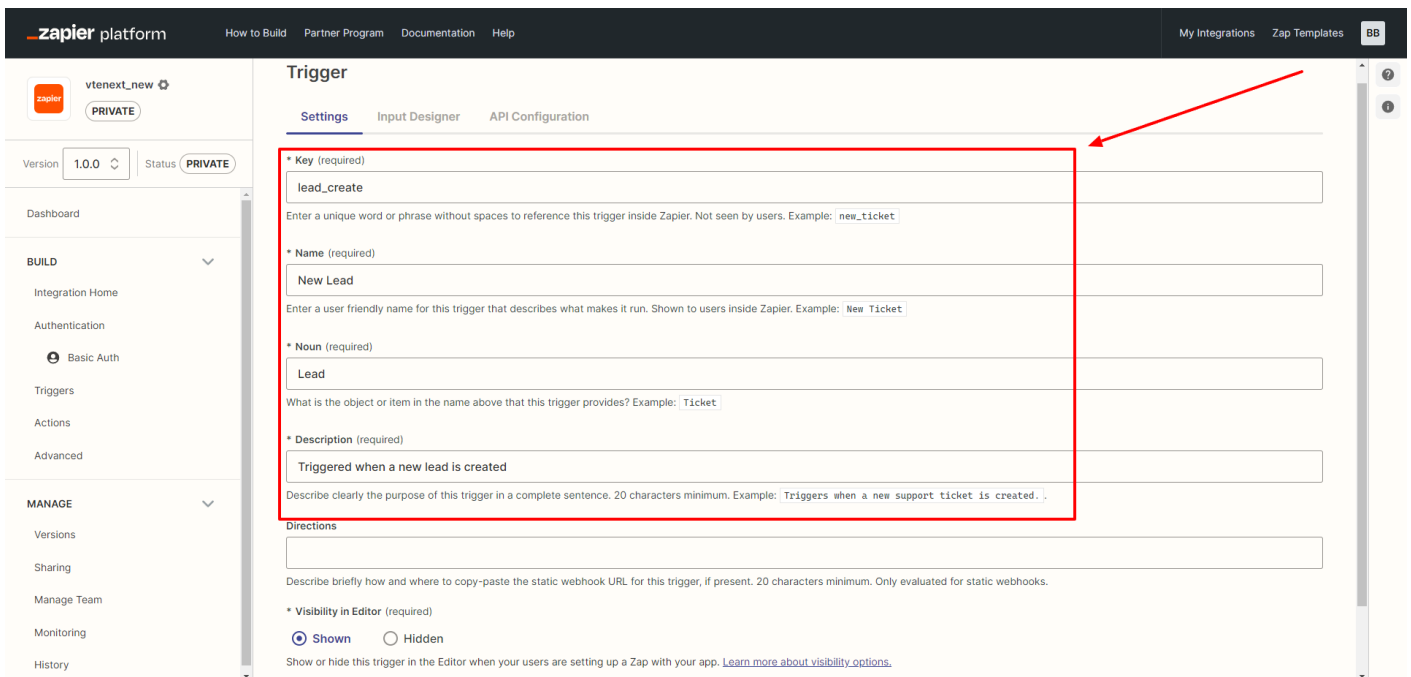
4. Trigger creation

This step is optional, it's necessary only if we want to execute Zapier actions when in vtenext some condition is met (for example, when a Lead is created, or when a condition of a process is satisfied).

Let's add a trigger as shown below:

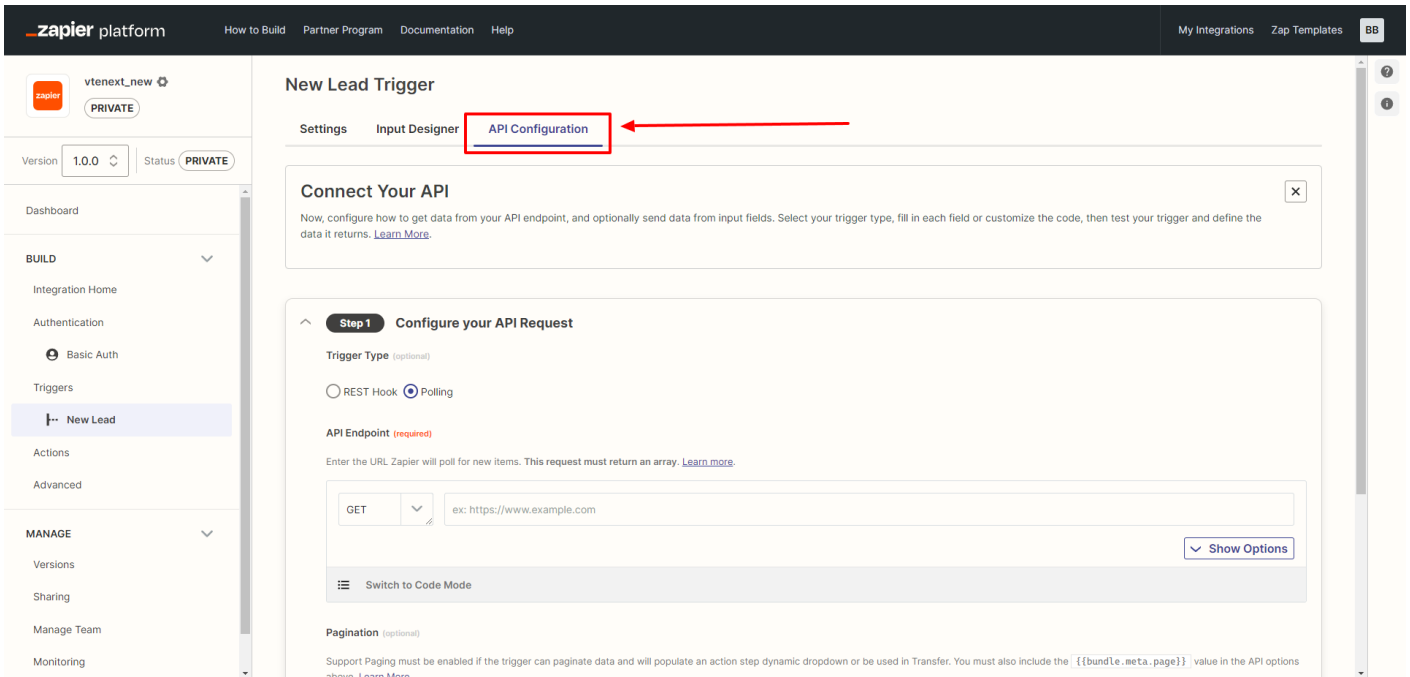


Clicking on the CREATE A TRIGGER button will present a screen with some fields to fill in. These fields should be managed based on what you want to achieve with the trigger itself (in the example, it involves intercepting the creation of a new Lead).



Once all the fields are filled in, click on **SAVE & CONTINUE** at the bottom of the page on the right.

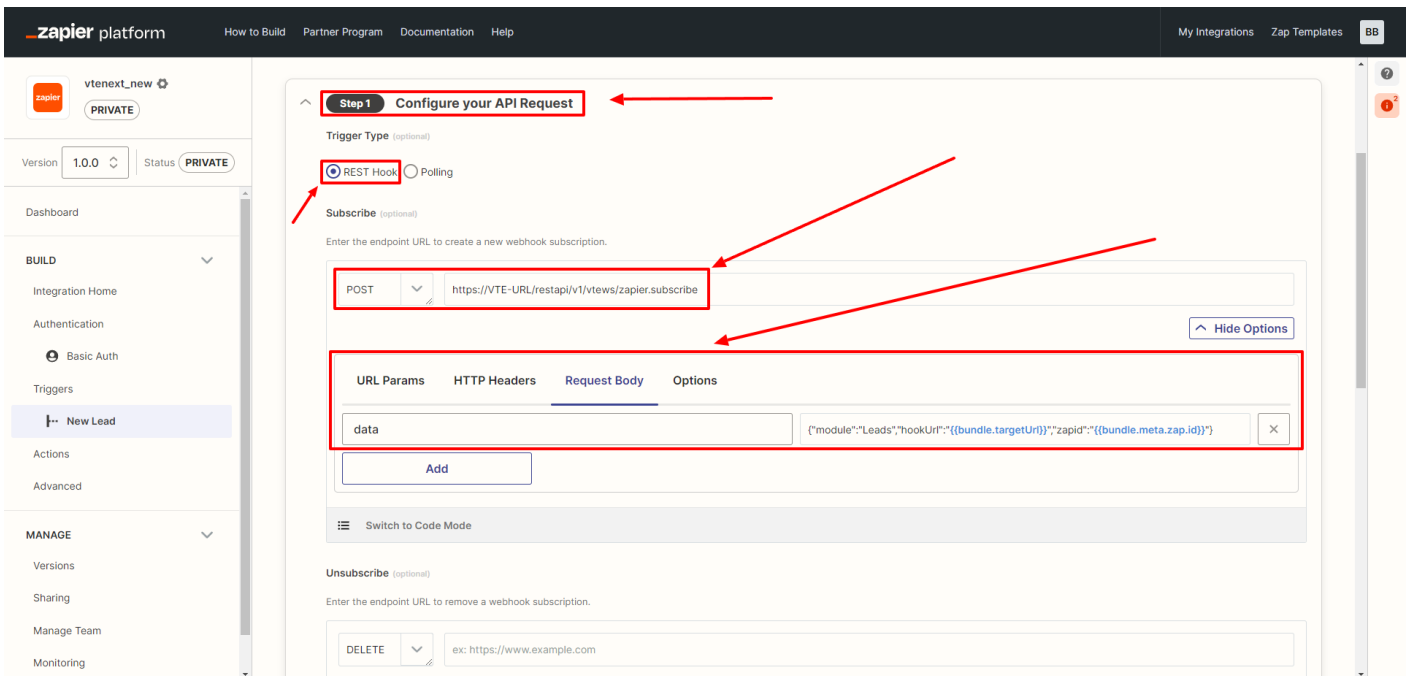
Immediately after, the following page will appear, where you will need to click on **API CONFIGURATION** to create a webhook.



In **STEP 1**, choose the following parameters:

SUBSCRIBE

- REST Hook (select it)
- POST (select it from the dropdown menu, then enter the following webhook, replacing VTE-URL with the correct address of your CRM)



```
https://VTE-URL/restapi/v1/vtews/zapier.subscribe  
{  
  "module": "Leads",  
  "hookUrl": "{{bundle.targetUrl}}",  
  "zapid": "{{bundle.meta.zap.id}}"  
}
```

In this code, you can replace "Leads" with the module you want to configure.

Continuing the configuration, scrolling down the page, we find the **UNSUBSCRIBE** option, which should be configured with the following code.

The screenshot shows the Zapier configuration interface for the 'Unsubscribe' action. The 'Request Body' tab is selected, showing a JSON payload: `{"module":"Leads","hookUrl":"{{bundle.targetUrl}}","zapid":"{{bundle.meta.zap.id}}"}`. Below this, the 'Unsubscribe' section is highlighted with a red box. It includes a dropdown menu set to 'POST' and a URL field containing `https://VTE-URL/restapi/v1/vtews/zapier.unsubscribe`. A second red box highlights the 'Request Body' tab, which is currently empty. Below that, a 'Perform List' section is visible, with a URL field containing `id` and a value field containing `{{bundle.subscribeData.id}}`. Red arrows point from the text above to these specific configuration elements.

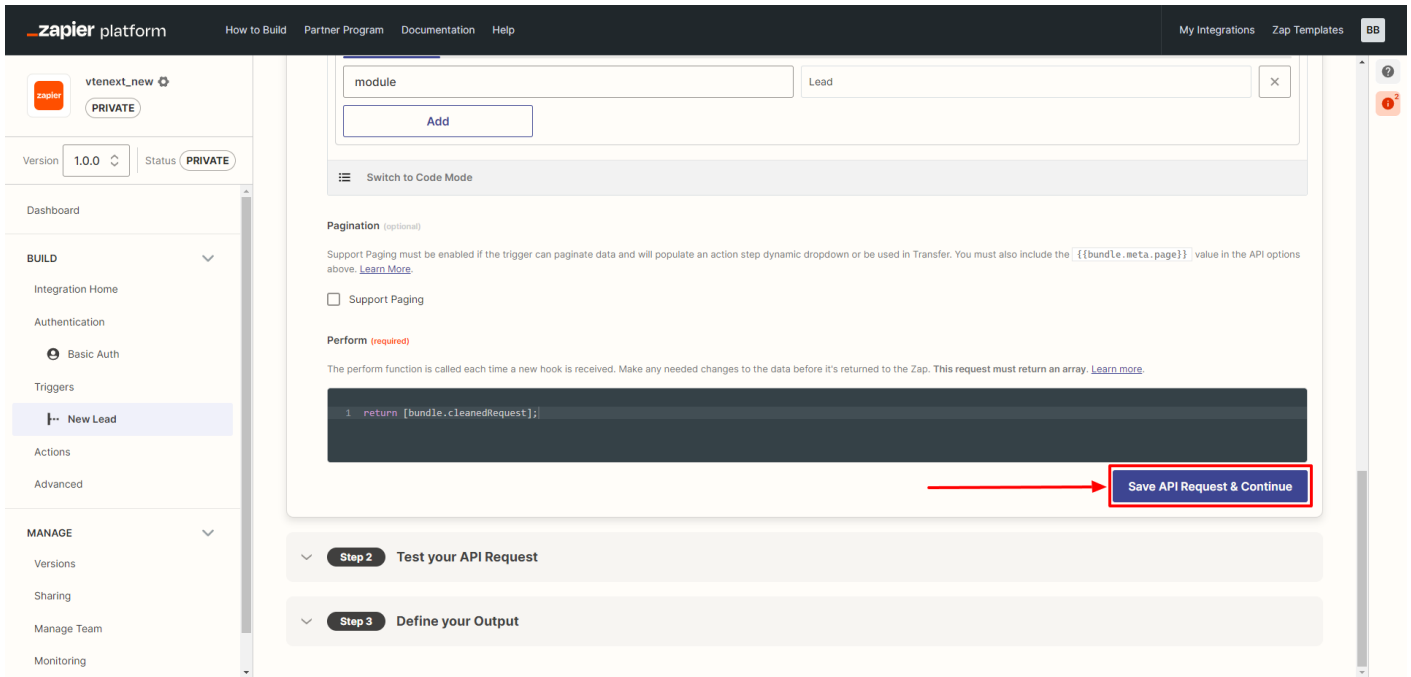
```
https://labs2.vtecrm.net:8443/restapi/v1/vtews/zapier.unsubscribe  
{{bundle.subscribeData.id}}
```

Continuing with the **PERFORM LIST** parameter, you will need to configure the following code:

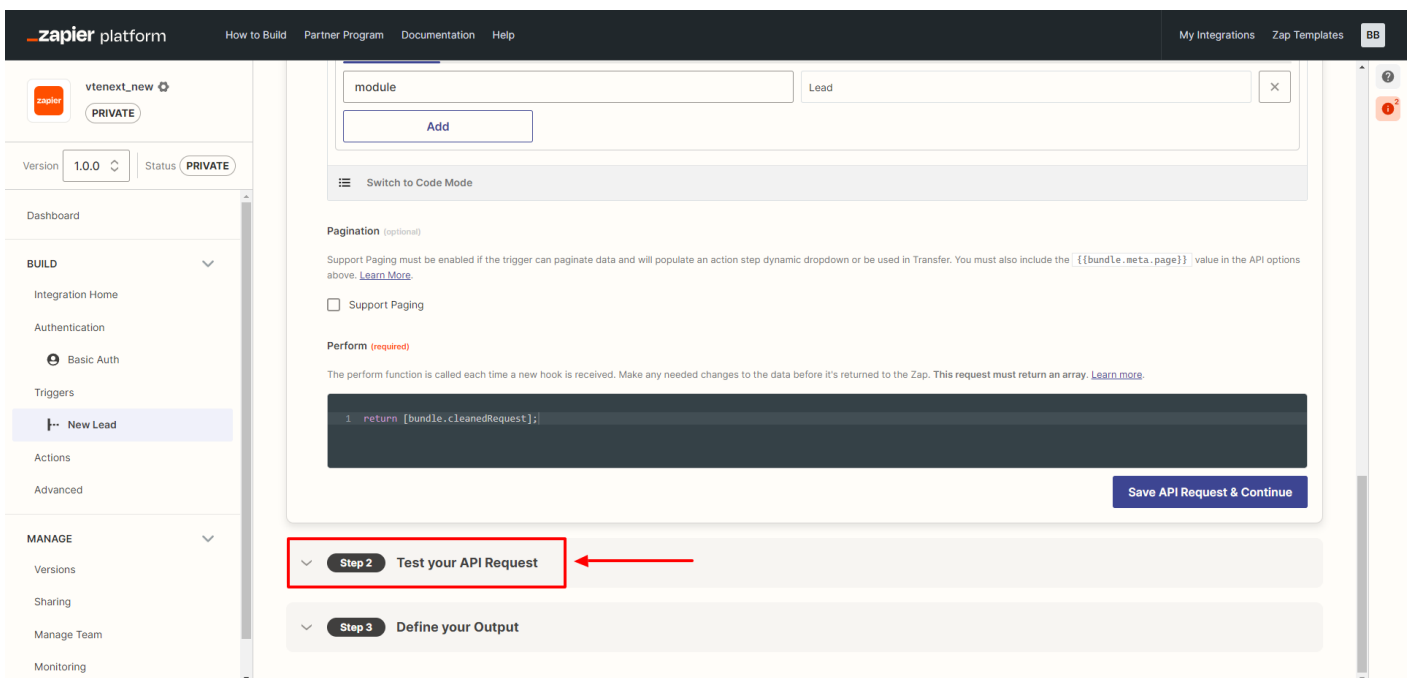
The screenshot shows the Zapier configuration interface for the 'Perform List' action. The 'Request Body' tab is selected, showing a JSON payload: `module` with a value of `Leads`. The 'Perform List' section is highlighted with a red box. It includes a dropdown menu set to 'POST' and a URL field containing `https://VTE-URL/restapi/v1/vtews/zapier.perform_list`. Below that, the 'Request Body' tab is highlighted with a red box, showing the 'module' field with the value 'Leads'. Red arrows point from the text above to these configuration elements.

```
https://VTE-URL/restapi/v1/vtews/zapier.perform_list  
Leads
```

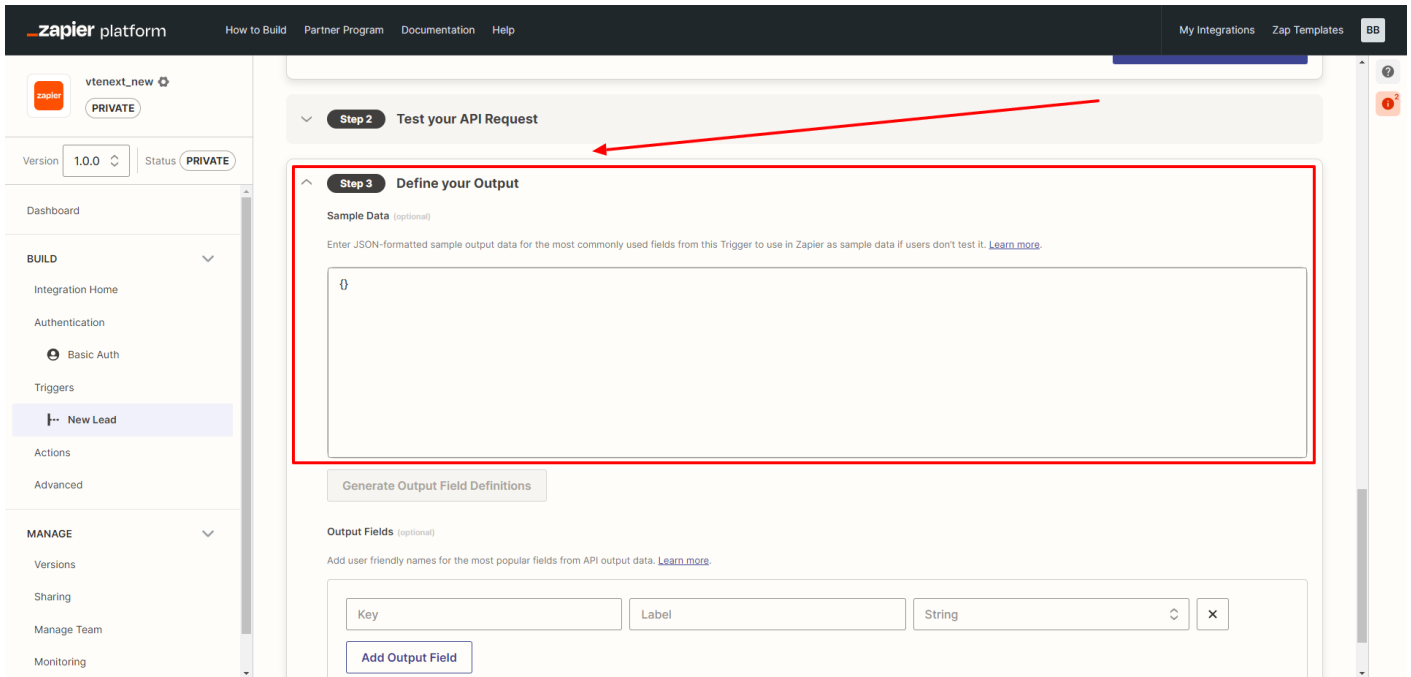
Finally, for **PAGINATION**, there is nothing to configure, and you can click on **SAVE API Request & Continue**.



At **STEP 2** of the Trigger configuration, nothing needs to be configured.



At **STEP 3** of the Trigger configuration, it is necessary to **leave** the field in that block empty.



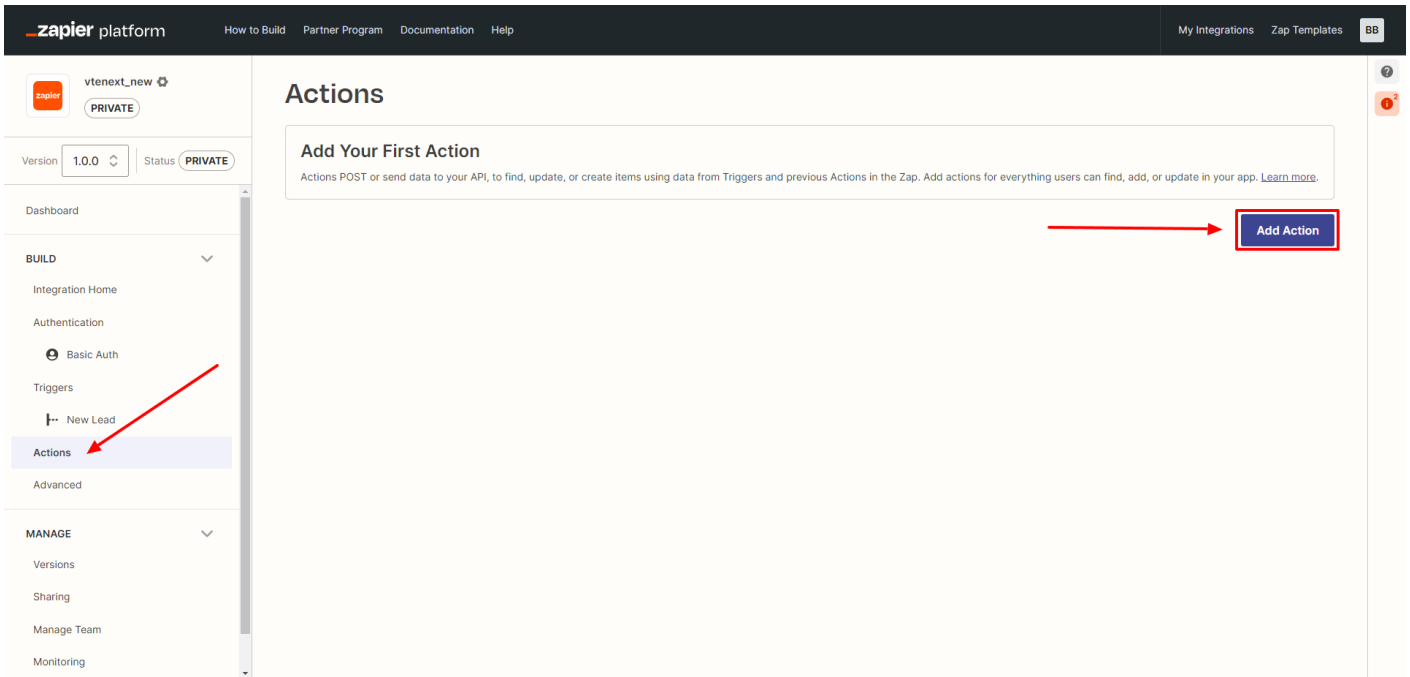
5. Creating Actions

Also in this case, this step is optional, it's necessary only if we want to execute actions in vtenext when the Zapier trigger satisfies its conditions. Actions available in vtenext are: search of a record, creation, update or deletion.

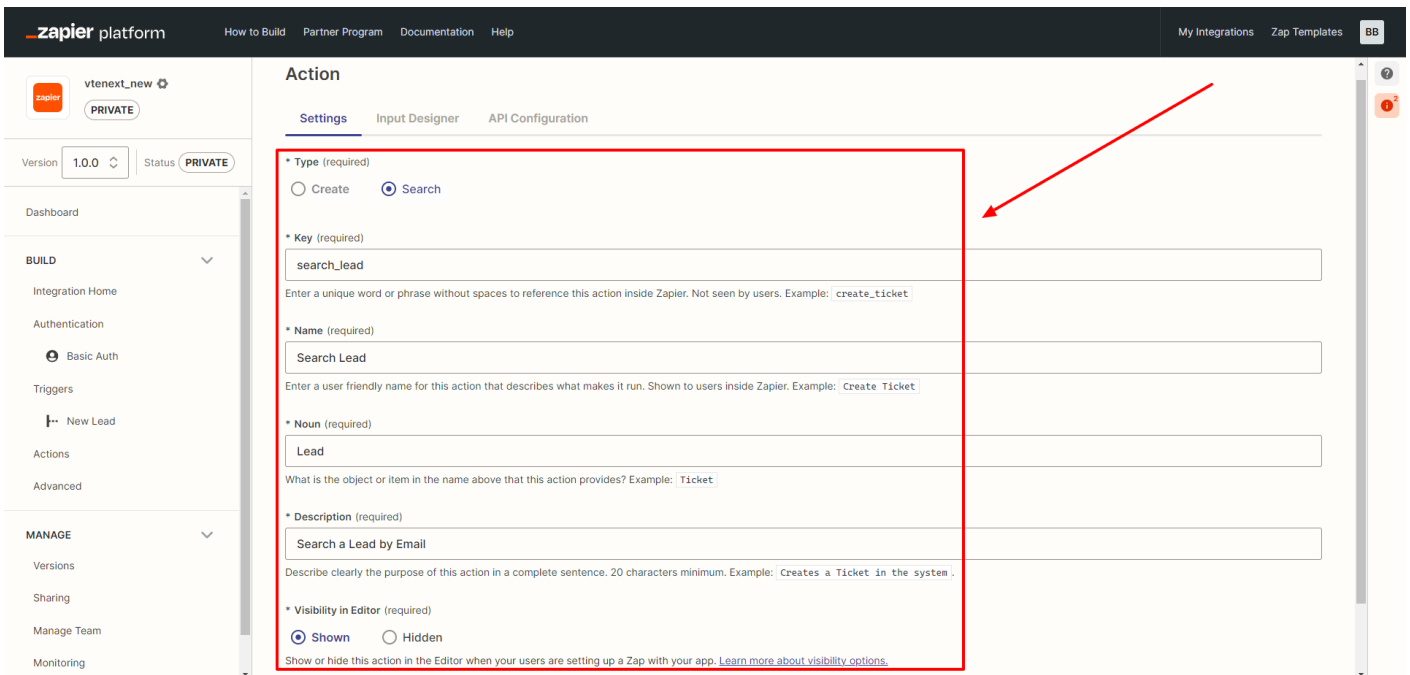
Moreover, it's possible to only create the actions required by your own integration.

I. Search Action

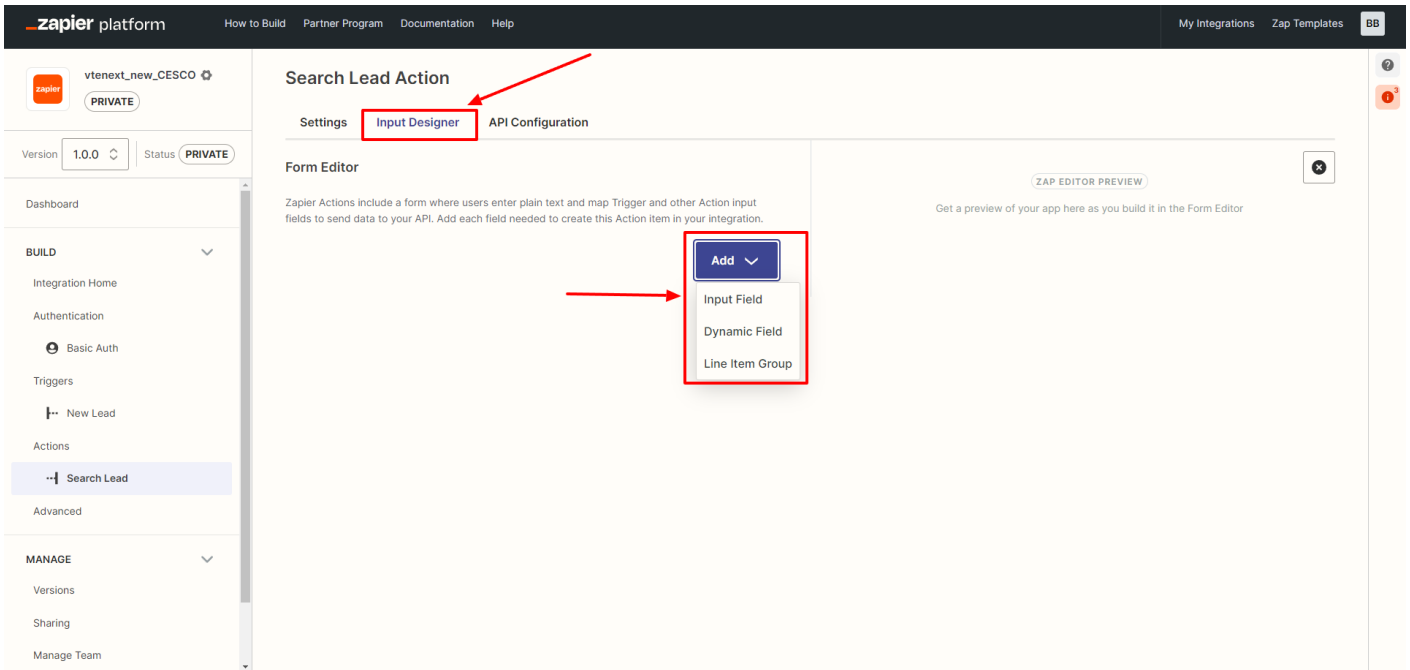
On the left-hand column, click on the **ACTION** item, and then on the right, click on the **CREATE ACTION** button.



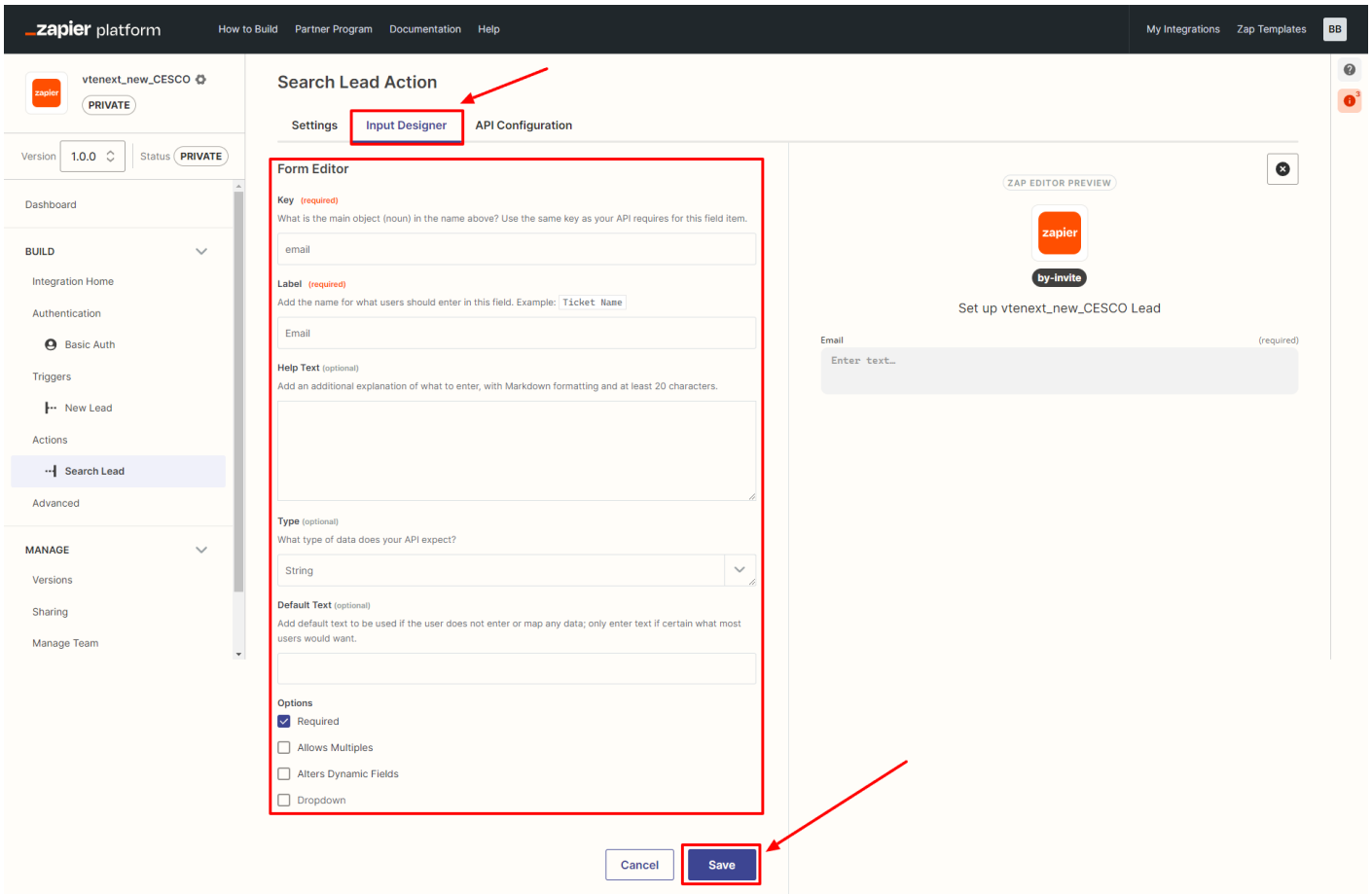
It will open the following screen, which needs to be filled out as shown.



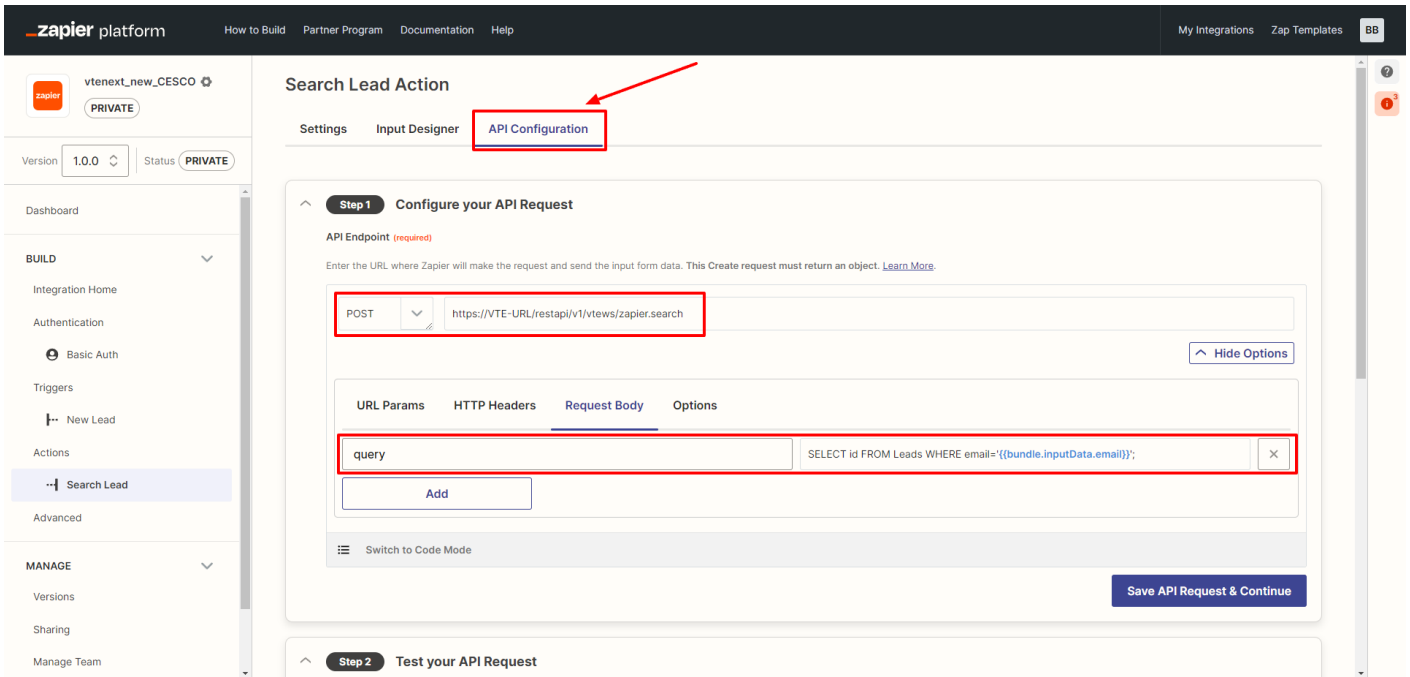
After completing the fields as shown in the previous image, you can click on **SAVE AND CONTINUE**. This will allow you to move to the next TAB to configure the **INPUT DESIGNER**.



In this screen, click on **ADD**, choose **INPUT FIELD**, and the next configuration screen will appear.



Enter the variables in the appropriate fields as indicated and then click on the **SAVE** button. This will move you to the **API CONFIGURATION** tab.



In this screen, enter the variables as shown. Replace "VTE-URL" with the full address of your vtenext installation. Finally, click on **SAVE API REQUEST & CONTINUE**.

```
https://VTE-URL/restapi/v1/vtews/zapier.search  
SELECT id FROM Leads WHERE email='{{bundle.inputData.email}}';
```

In the TEST phase of STEP 2 on this page, enter a valid and existing email address for connection testing.

For the OUTPUT tab:

1. Use the response from the test data.
2. Generate output field definitions.
3. Set the appropriate type for each field.

Finally, click on **SAVE OUTPUT & FINISH** at the bottom right.

II. Create Action

Click on **ADD ACTION** to create a new action and fill the Settings tab as the following image:

zapier platform My integrations Zap templates Docs Tools Partner program Resources

Vtenext2 Private

Version 1.0.0 Private

Version overview
Authentication
Basic Auth
Triggers
New Lead
Actions
Create Lead
Update Lead
Delete Lead
Search Lead
Advanced

Manage Versions
Sharing
Manage team

Create Lead Action

Settings Input Designer API Configuration

* Type (required)
 Create Search

* Key (required)
create_lead
Enter a unique word or phrase without spaces to reference this action inside Zapier. Not seen by users. Example: create_ticket

* Name (required)
Create Lead
Enter a user friendly name for this action that describes what makes it run. Shown to users inside Zapier. Example: Create Ticket

* Noun (required)
Lead
What is the object or item in the name above that this action provides? Example: Ticket

* Description (required)
Create a lead in Vtenext
Describe clearly the purpose of this action in a complete sentence. 20 characters minimum. Example: Creates a Ticket in the system.

* Visibility in Editor (required)
 Shown Hidden
Show or hide this action in the Editor when your users are setting up a Zap with your app. [Learn more about visibility options.](#)

Click **SAVE AND CONTINUE** and move to the next TAB, to configure the **INPUT DESIGNER**, where a new **INPUT FIELD** should be added and configured in this way:

zapier platform My integrations Zap templates Docs Tools Partner program Resources

Vtenext2 Private

Insights

Build

Version 1.0.0 Private

Version overview
Authentication
Basic Auth
Triggers
New Lead
Actions
Create Lead
Update Lead
Delete Lead
Search Lead
Advanced

Manage

Create Lead Action

Settings Input Designer API Configuration

Form Editor

Next up — Create a Zap with this action!
Be sure to turn it on and let it run at least once with real data. This is required before publishing.
[Create a Zap](#)

Key (required)
What is the main object (noun) in the name above? Use the same key as your API requires for this field item.
dataField

Label (required)
Add the name for what users should enter in this field. Example: Ticket Name
dataField

Help Text (optional)
Add an additional explanation of what to enter, with Markdown formatting and at least 20 characters.

Type (optional)
What type of data does your API expect?
Dictionary

Default Text (optional)
Add default text to be used if the user does not enter or map any data; only enter text if certain what most users would want.

Options
 Required
 Allows Multiples
 Alters Dynamic Fields
 Dropdown

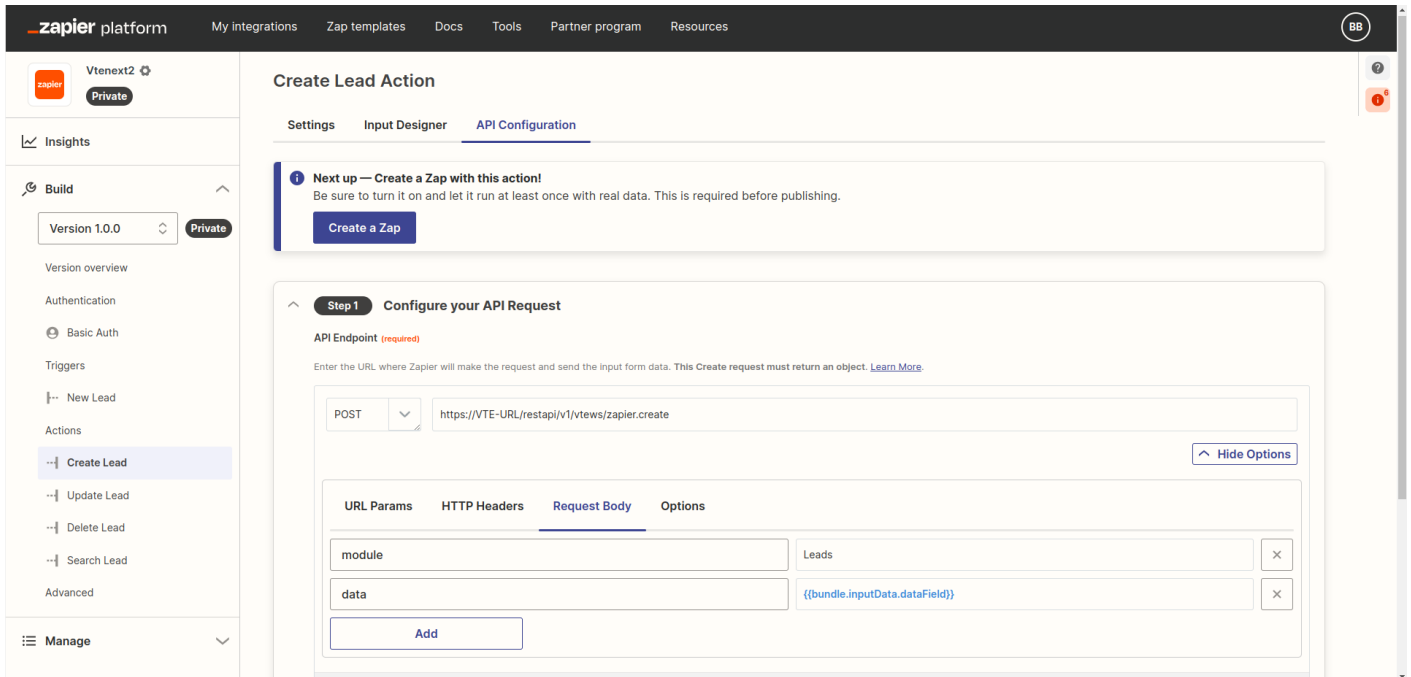
[Cancel](#) [Save](#)

ZAP EDITOR PREVIEW

Set up Vtenext2 Lead

dataField (required)

Click on **SAVE** and move to the tab **API Configuration** and configure parameters in the **STEP 1** like this:



```
https://VTE-URL/restapi/v1/vtews/zapier.create
```

```
module = Leads
```

```
data = {{bundle.inputData.dataField}}
```

Clearly, VTE-URL should be replaced with the complete address of your vtenext installation, while the term "Leads" can be replaced with another module, in case you wish to create a different entity (for example Contacts or Accounts). Then click on **SAVE API REQUEST & CONTINUE**.

In **STEP 2**, to make a test choose **"Raw"** and replace all the code with the following:

```
{
  "inputData": {
    "dataField": {
      "firstname": "Test lead",
      "lastname": "Zapier",
      "phone": "123456789",
      "company": "Test Company Zapier"
    }
  },
  "authData": {},
  "environment": {},
  "subscribeData": {}
}
```

```

"cleanedRequest": {
  "url": "https://example.com/hook-request-origin",
  "method": "POST",
  "body": {},
  "headers": {
    "Content-Type": "application/json"
  }
}
}
}

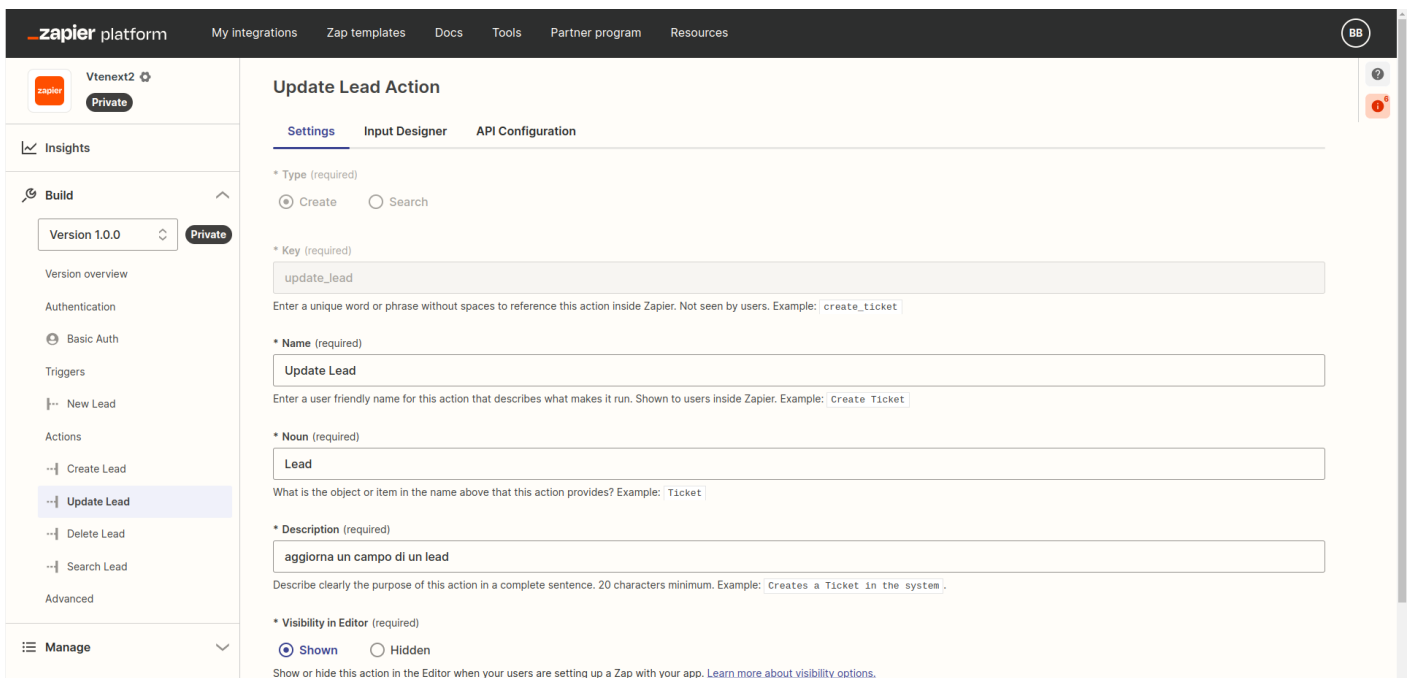
```

and click on **Test Your Request**, which should result in the creation of a Lead with name "Test Lead" and surname "Zapier" in your vtenext instance. Then click **Finish Testing & Continue**.

In **STEP 3** click on **Use Response from Test Data** and then **Generate Output Field Definitions** to automatically map the returned fields. Finally, click on **Save Output & Finish**.

III. Update Action

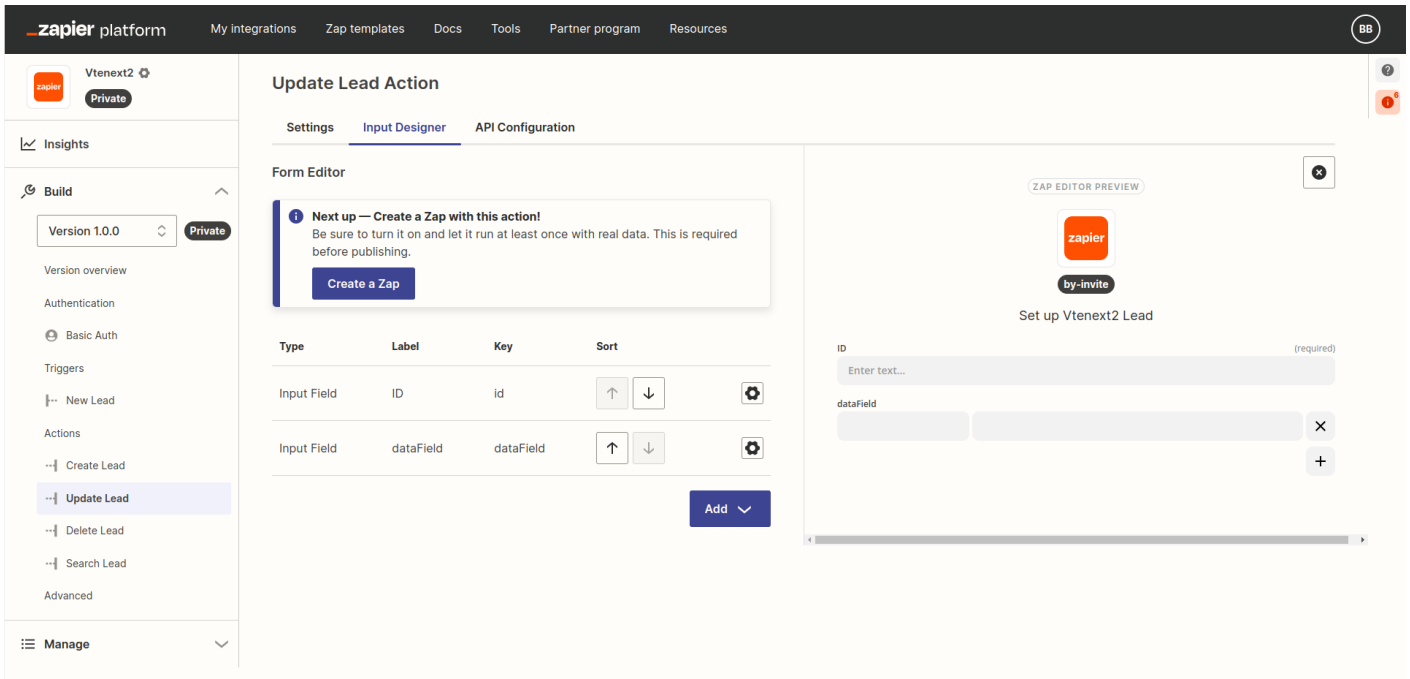
Click on **ADD ACTION** to create a new action and fill the Settings tab as the following image:



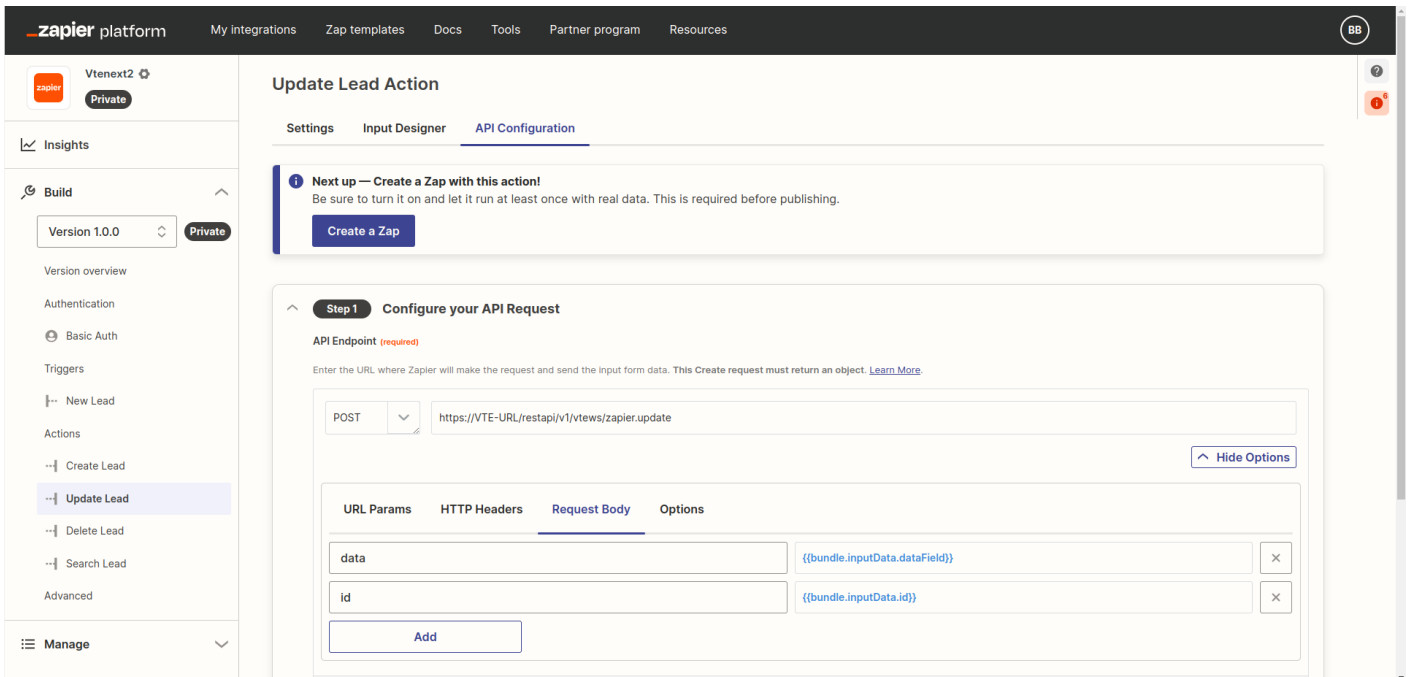
In the **INPUT DESIGNER** tab, create 2 fields of type **Input Field**, with the following characteristics:

1. Key = id, Label = ID, Type = String, Required = yes
2. Key = dataField, Label = dataField, Type = Dictionary, Required = no

Once created, we should have the following situation:



Move to the tab **API Configuration** and configure parameters in **STEP 1** like this:



```
https://VTE-URL/restapi/v1/vtews/zapier.update
```

```
id = {{bundle.inputData.id}}
```

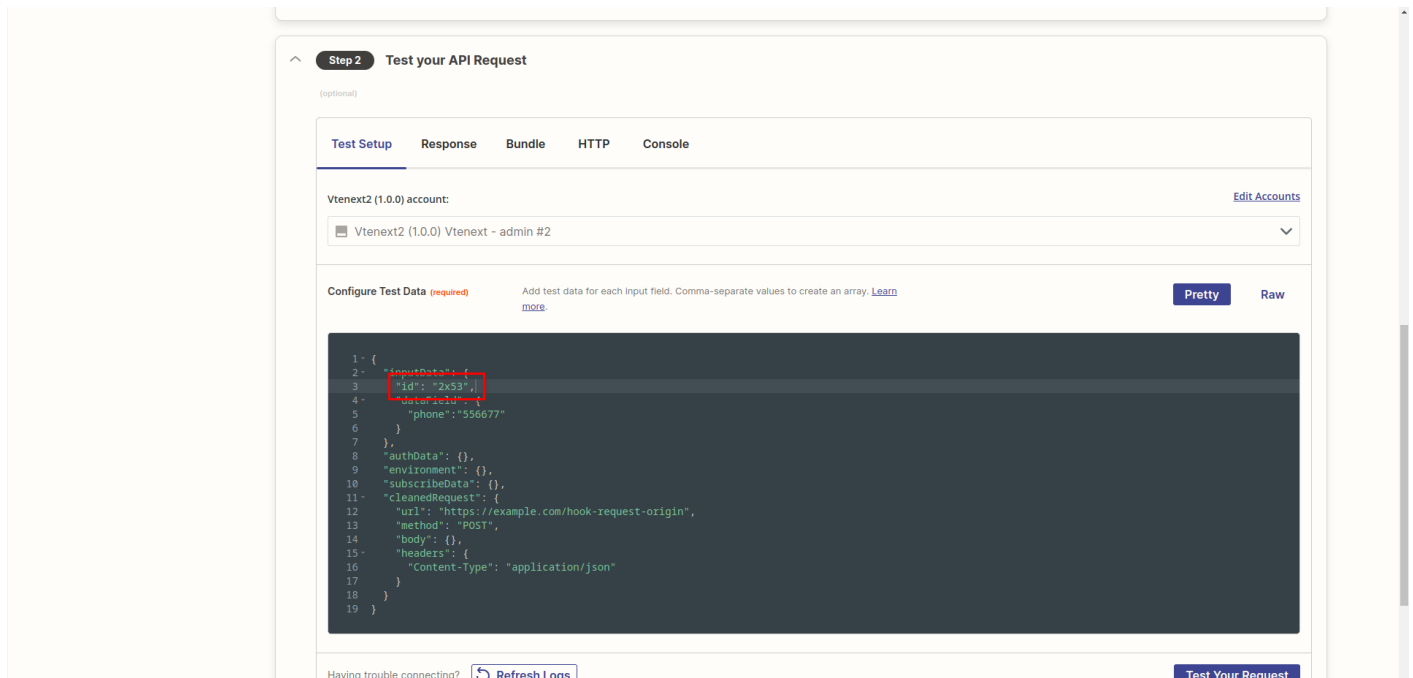
```
data = {{bundle.inputData.dataField}}
```

Replacing VTE-URL with the full address of your vtenext installation. Then click on **SAVE API REQUEST & CONTINUE**.

In **STEP 2**, to make a test choose **"Raw"** and replace all the code with the following:

```
{
  "inputData": {
    "id": "2x53",
    "dataField": {
      "phone": "556677"
    }
  },
  "authData": {},
  "environment": {},
  "subscribeData": {},
  "cleanedRequest": {
    "url": "https://example.com/hook-request-origin",
    "method": "POST",
    "body": {},
    "headers": {
      "Content-Type": "application/json"
    }
  }
}
```

but replacing the "53" at line 3 with the ID of a lead in your installation:



The screenshot shows the 'Test your API Request' interface in Vtex. The 'Test Setup' tab is active, displaying the account 'Vtenext2 (1.0.0) Vtenext - admin #2'. Below this, the 'Configure Test Data' section shows a JSON request body. The 'id' field in the 'inputData' object is highlighted with a red box, indicating the value '2x53' should be replaced with a valid lead ID. The interface includes tabs for 'Test Setup', 'Response', 'Bundle', 'HTTP', and 'Console', and buttons for 'Pretty', 'Raw', 'Refresh Logs', and 'Test Your Request'.

← → ↻ 🏠 Non sicuro 192.168.8.30/vte2737/index.php?module=Leads&parenttab=Marketing&action=DetailView&recordid=53

Cerca...

Lead Johnson Patricia

INFORMAZIONI GRAFICO PROCESSO STORICO PROCESSO STORICO

Informazioni Lead

Nome	Patricia	Numero Lead	LEA2
Cognome	Johnson	Telefono	(198) 823-5641
Società	T3m Invest a/s	Cellulare	(552) 258-5934
Titolo	Director Operations	Fax	
Fonte Lead	Autogenerato	Email	patricia_johnson@company.com
Settore		Sito Web	www.t3minvesta/s.com
Fatturato (€)	0.00	Stato Lead	Tentativo di contatto
Numero Impiegati	0	Rating	
		Acquisito	

By clicking on **Test Your Request** you should get a result like the following:

Save API Request & Continue

Step 2 Test your API Request

(optional)

Test Setup Response 2 Bundle 1 HTTP Console

Request Successful

```
1- {
2  "salutationtype": "",
3  "firstname": "Patricia",
4  "lead_no": "LEA2",
5  "lastname": "Johnson",
6  "phone": "5566777",
7  "company": "T3m Invest a/s",
8  "mobile": "(552) 258-5934",
9  "designation": "Director Operations",
10 "fax": "",
11 "leadsource": "Self Generated",
12 "email": "patricia_johnson@company.com",
13 "industry": "",
14 "website": "www.t3minvesta/s.com",
15 "annualrevenue": "0",
16 "leadstatus": "Attempted to Contact",
17 "noofemployees": "0",
18 "rating": "Acquired",
19 "newsletter_unsubscript": "1",
20 "assigned_user_id": "19x1",
21 "modifiedtime": "2024-04-11 11:09:46",
```

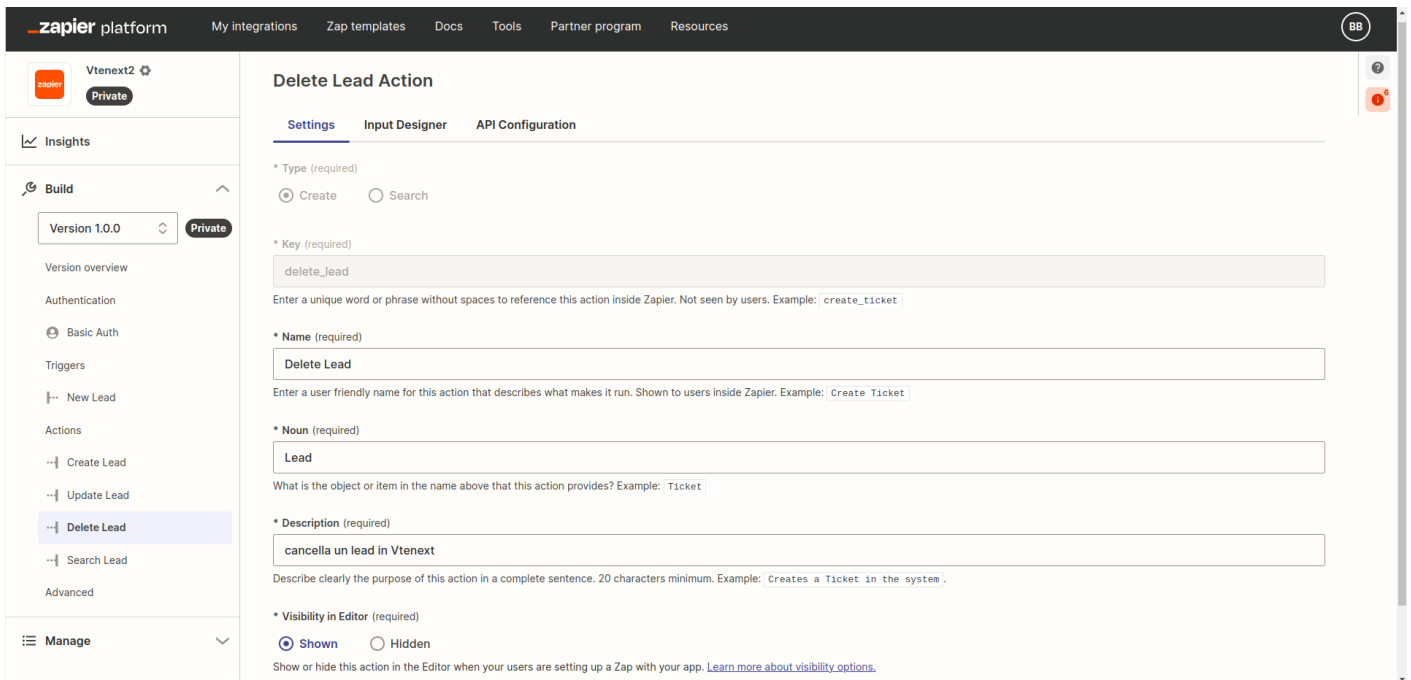
Test Again

Finish Testing & Continue

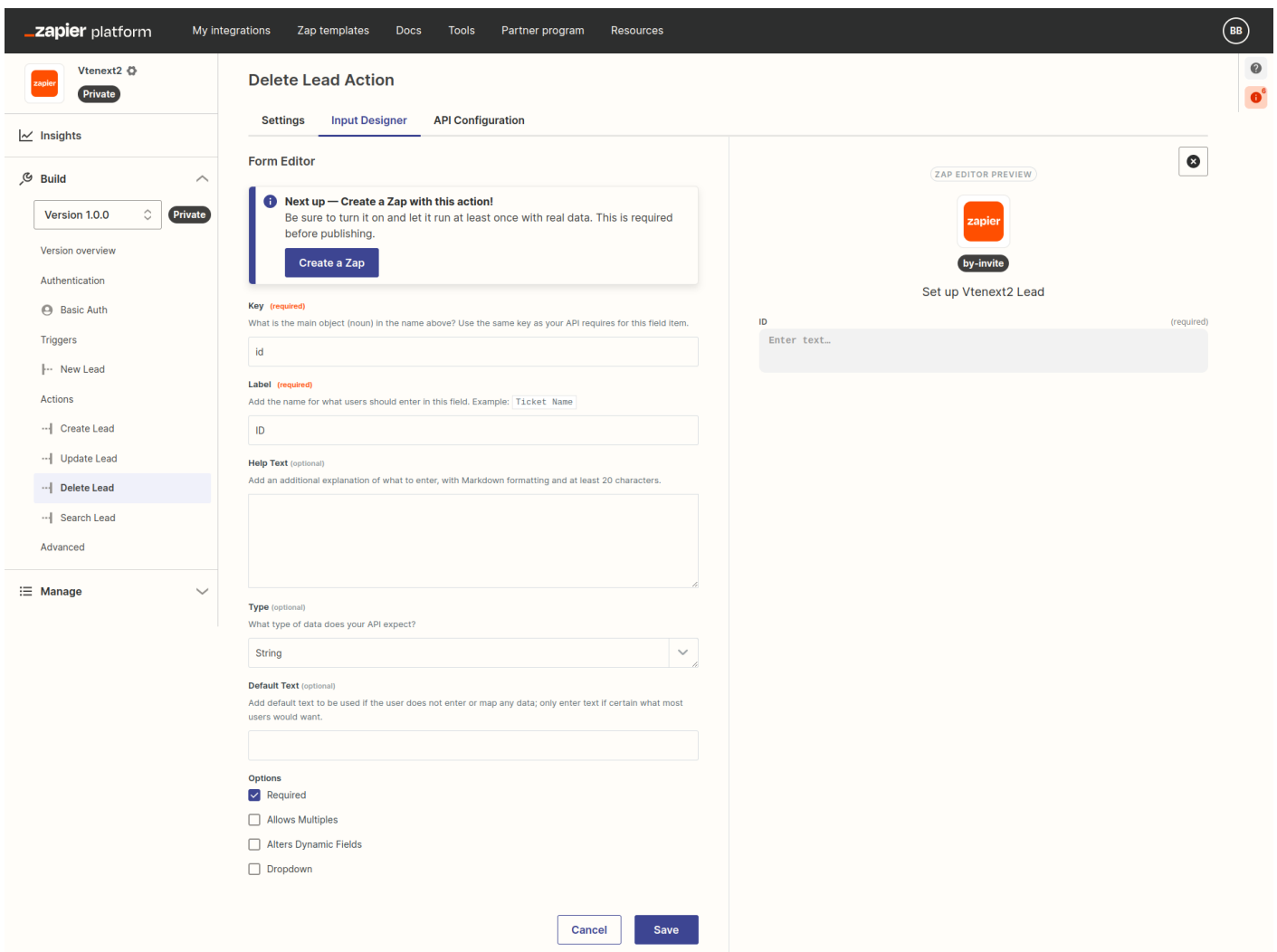
Finally, in **STEP 3** click on **Use Response from Test Data** and then **Generate Output Field Definitions** to automatically map the returned fields. Click then on **Save Output & Finish**.

IV. Delete Action

Click on **ADD ACTION** to create a new action and fill the Settings tab as the following image:



In the **INPUT DESIGNER** tab, create a field of type Input Field, with the following characteristics:



Move to the tab **API Configuration** and configure parameters in **STEP 1** like this:

The screenshot shows the Zapier interface for configuring the 'Delete Lead Action'. The left sidebar contains navigation options like 'Insights', 'Build', and 'Manage'. The main area is titled 'Delete Lead Action' and has tabs for 'Settings', 'Input Designer', and 'API Configuration'. A notification at the top says 'Next up — Create a Zap with this action!'. Below that, 'Step 1: Configure your API Request' is active. The 'API Endpoint' is set to 'https://VTE-URL/restapi/v1/vtews/zapier.delete'. The 'Request Body' tab is selected, showing a field for 'id' with the value '{{bundle.inputData.id}}'. There are buttons for 'Add', 'Hide Options', and 'Switch to Code Mode'.

```
https://VTE-URL/restapi/v1/vtews/zapier.delete
```

```
id = {{bundle.inputData.id}}
```

Replacing VTE-URL with the full address of your vtenext installation. Then click on **SAVE API REQUEST & CONTINUE**.

In **STEP 2** insert as test value the ID of the Lead you wish to delete, in webservice format, so like "2xCRMID", for example:

The screenshot shows 'Step 2: Test your API Request'. A 'Request Failed' error is displayed. The 'Test Setup' tab is active, showing the 'Vtenext2 (1.0.0) account' dropdown set to 'Vtenext2 (1.0.0) Vtenext - admin #2'. The 'Configure Test Data' section has the 'id' field set to '2x|016'. Buttons for 'Pretty', 'Raw', 'Test Your Request', and 'Finish Testing & Continue' are visible. A 'Refresh Logs' button is also present.

In this action it's not necessary to configure **STEP 3** about the output fields.

Congratulations! The creation of the integration is complete!

You can now configure specifics ZAP to integrate different services with vtenext.

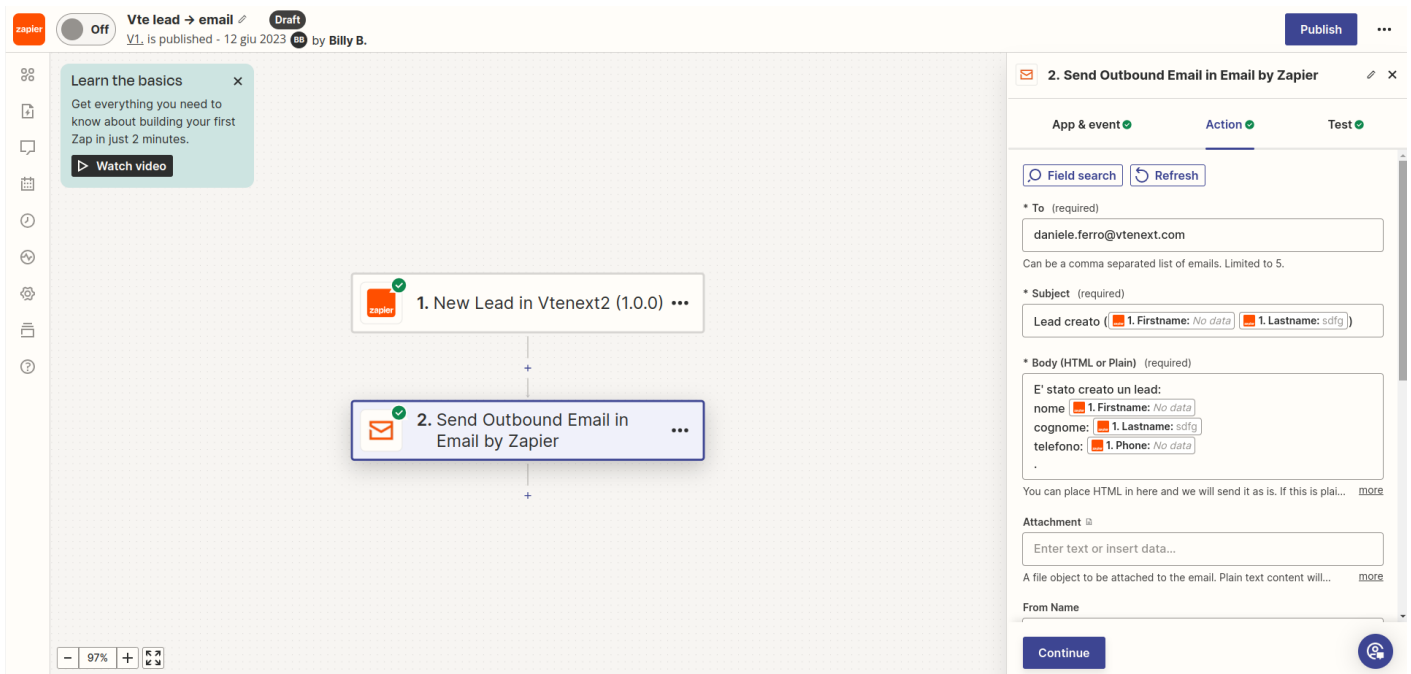
Zap creation

Examples: How to create ZAP

Example 1 - Trigger from vtenext with action in Zapier

in this example we send an email when a Lead is created in vtenext:

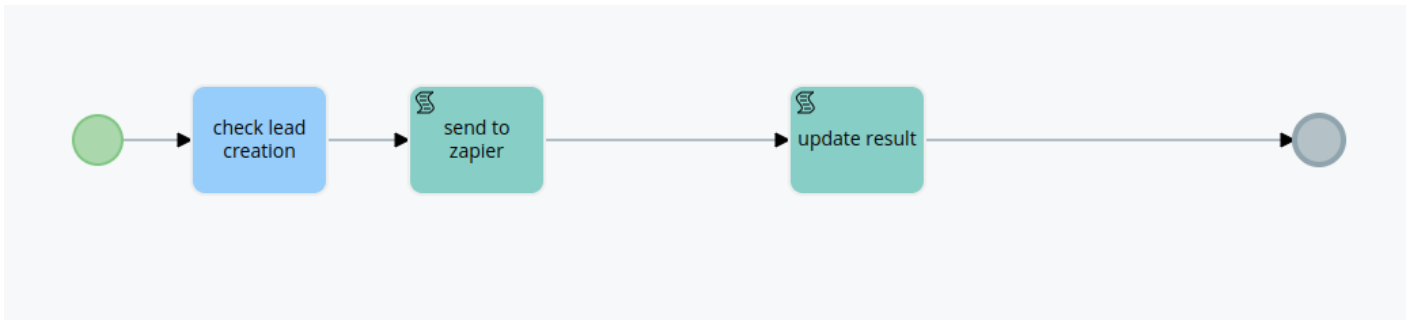
1. Go to <https://zapier.com/app/dashboard>
2. Click on **Create**
3. Trigger: vtenext, event = new lead, account = use a valid account
4. Test it, you should get a Lead, click on **Continue with selected record**
5. Add an action, for example **Email by Zapier -> Send Outbound Email**
6. In this action, configure the fields:
 - To: email address which will receive the email
 - Subject: Lead Created + variables from the email
 - Body: Text of the email with variables



Click on **Continue** and check if you received the email. Click then on **PUBLISH** and verify that the Zap is active.

Now, to set off the trigger from vtenext a process containing the call to Zapier must be created.

In the simplest case, the process can have this flow:



And one of the actions should be of type "Call External Webservice", using the webservice that was automatically created when the Zap was activated. The action should be configured as follows:

Azione: Chiama Web service esterno

Salva Annulla

Titolo azione: zapier lead

Web service: Send to Zapier - Leads

Indirizzo: Selezione Opzione...

Autenticazione:

Parametri:

Corpo grezzo: Selezione Opzione...

Campi restituiti:

attempt	<input type="text"/>	id	<input type="text"/>
attempt	<input type="text"/>	id	<input type="text"/>
request_id	<input type="text"/>	status	Selezione Opzione...

In the **Raw body** the string to use is

```
$sdk:vte_json_record($1-crmid)
```

where \$1-crmid is the record handled by the process, that we want to send to Zapier

or

```
$sdk:vte_json_field_string($1-crmid, firstname, lastname, phone, ...)
```

To send only some fields. You can choose the ones that interest you the most.

Once the process is active, when the action is executed, Zapier will receive the record and on it the action configured in the Zap will be executed.

NOTE: If the zap is deactivated and recreated, the process must be modified to use the new webservice.

Example 2 - Trigger from Zapier and action in vtenext

In this example, we will try to create a lead in vtenext when an email is sent to a Zapier address:

1. Go to <https://zapier.com/app/dashboard>
2. Click on **Create**
3. Trigger: **Email by Zapier** -> **New Inbound Email**
4. Configure a prefix for the mailbox, for example: testvte.trkbqw@zapiermail.com
5. Send an email to that address and verify that Zapier receives it
6. Create a new action: **Vtenext** -> **Create Lead**
7. Use the proper account and configure the fields to send to vtenext, remembering to map all mandatory fields (otherwise the Lead cannot be created), for example:

The screenshot displays the Zapier configuration interface. On the left, a sidebar shows a 'Learn the basics' video. The main workspace shows a Zap with two steps: '1. New Inbound Email in Email by Zapier' and '2. Create Lead in Vtenext2 (1.0.0)'. The right panel shows the configuration for the second step, '2. Create Lead in Vtenext2 (1.0.0)'. It includes a 'Field search' and 'Refresh' button. Below, a 'dataField' section shows three input fields: 'lastname', 'email', and 'company'. These are mapped to '1. From Name: Daniele Ferro', '1. From Email: daniele.ferro@vtenext.com', and 'Test Zapier' respectively. A 'Continue' button is visible at the bottom.

8. Make a test to verify the proper creation of the lead.

Finally, click on **PUBLISH**.

At this point, by sending emails to that configured Zapier address, leads are created in vtenext.

These are just a few examples of what the integration with Zapier can do. You can try and come up with all the triggers you want! Just think that, using Zapier paths, it is possible to create or update records by searching directly in the attributes of incoming emails. But it's just an example that helps you understand the power of the tool.

Azure - Single sign-on

Guides explaining how to create apps in Microsoft Azure to be used for Single sign-on in vtenext

Azure - Single sign-on

OIDC (OpenID Connect)

This content is not available in english, please refer to the italian version:

<https://usermanual.vtenext.com/books/creazione-di-app-esterne/page/oidc-openid-connect>

Azure - Single sign-on

SAML

This content is not available in english, please refer to the italian version:

<https://usermanual.vtenext.com/books/creazione-di-app-esterne/page/saml>