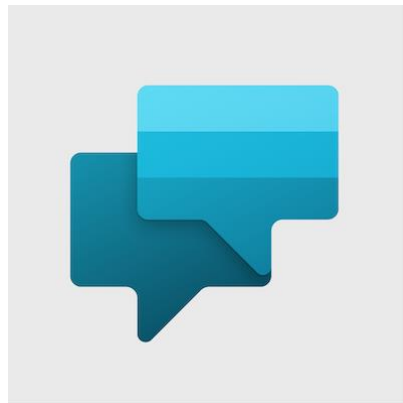# GLOBAL POWER PLATFORM BOOTCAMP 2021

Power Virtual Agents – Hands-On

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Get Started with Power Virtual Agents Chatbot development

Overview:

I Hope, you have completed the hands-on for Power Apps, Power Automate and Power BI. This is the last part of this Bootcamp. Here, we will develop a chatbot that will give the status for our device order which we have performed with Power Apps.
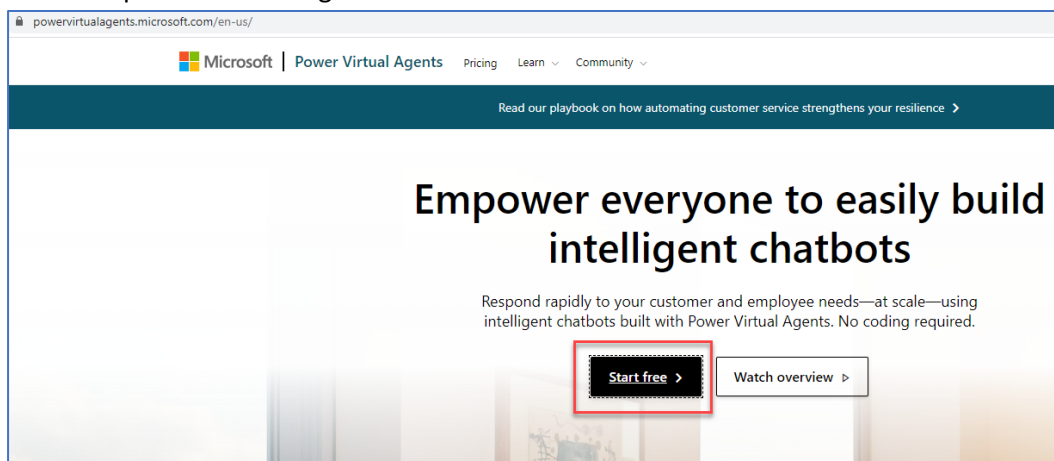
Let's get started!

Prerequisites

- You need a trial activated for Power Virtual Agents to perform this hands-on.
- If you already set up your Power Virtual Agents trial account login using the following URL. https://powerva.microsoft.com/

If you do not have an account set up, then follow this section to sign up for a free PVA trial account.

How to Sign Up for PVA Trial?

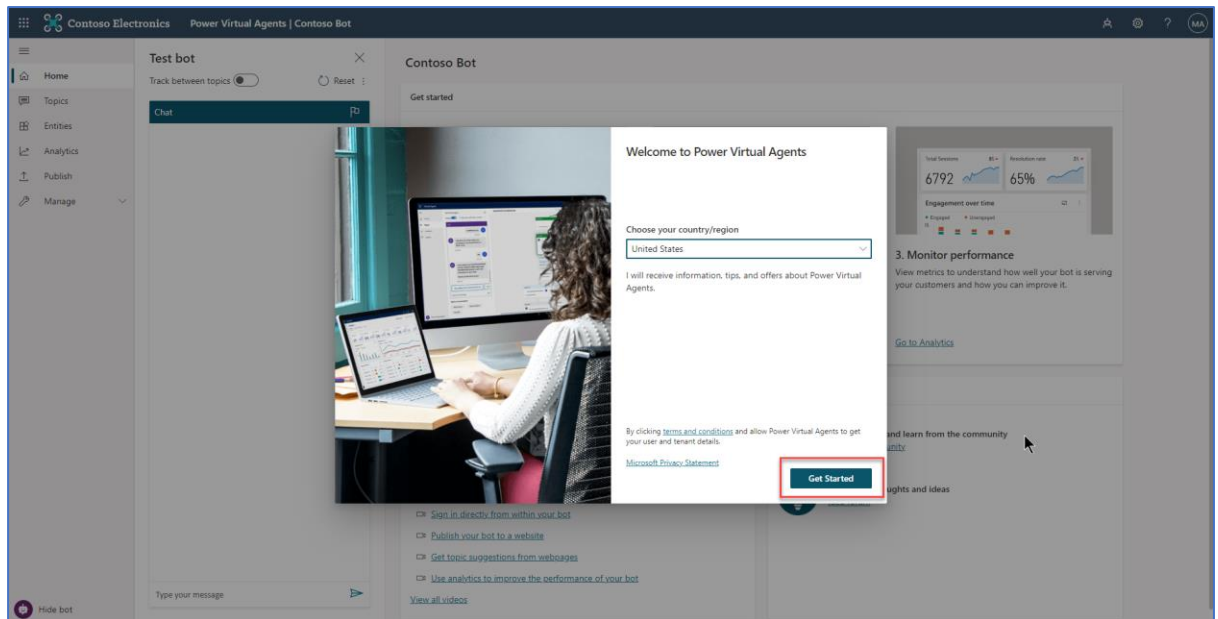1. Access PVA using URL: https://powervirtualagents.microsoft.com/en-us/
2. This will open the following screen. Click on Start free.

3. Login with your account and click on Next
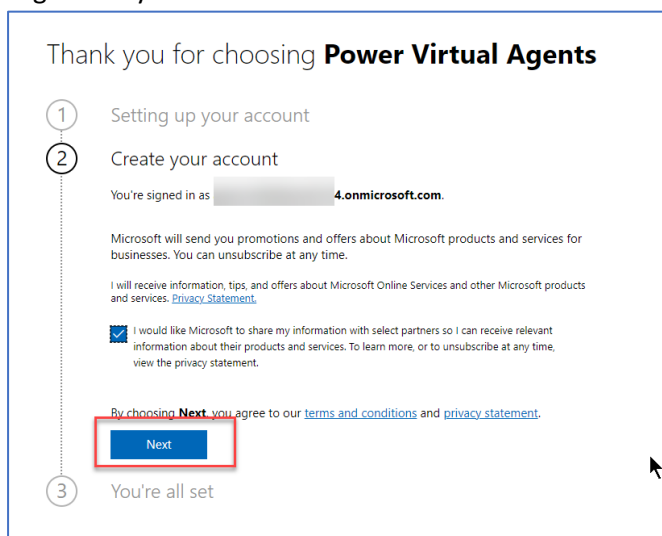
4. Once the account is set up, click on "**Get Started**".
5. Once set up successfully done, this will show the following screen.

Step 1: Build your first Power Virtual Agents Chatbot

Option 1 – First Time users follow below steps:

When you set up your PVA account for the first time, this will open the following pop up when you open the PVA portal using https://powerva.microsoft.com/
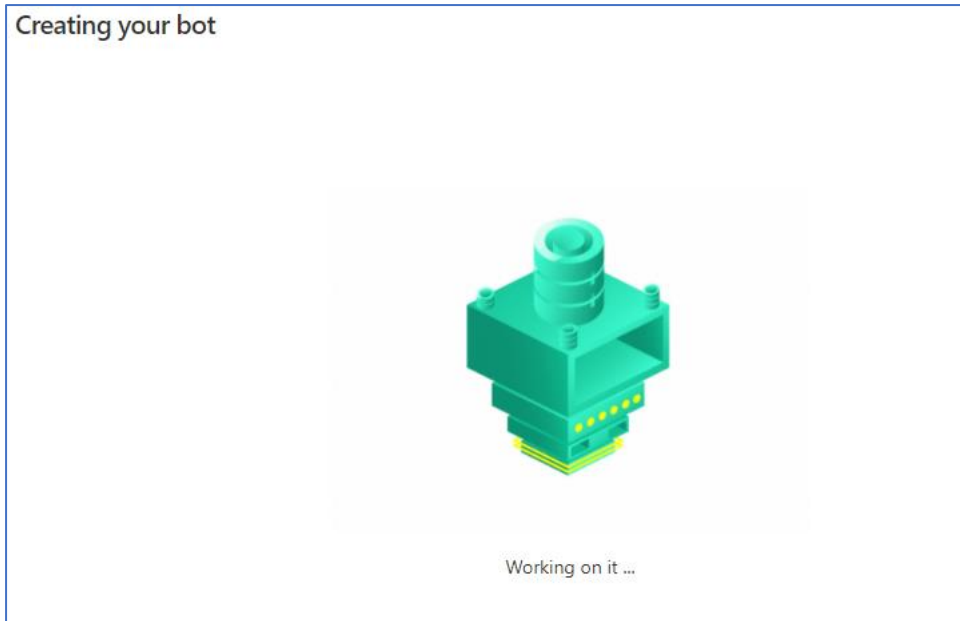
1. Please enter Chatbot name as "Device Order", Language as "English" and Environment is the same one where you developed your Power Apps.

2. This will take some time to create Chatbot.

Creating your bot

Working on it ...

3. This will create a new chatbot for you.

Option 2: If you already have PVA Set Up, follow below steps:

1. If you are not able to see the option to create a chatbot using the first 3 steps then, from the top right corner click on the New bot option.

Bots

+ New bot

Environment

BootCamp-Test
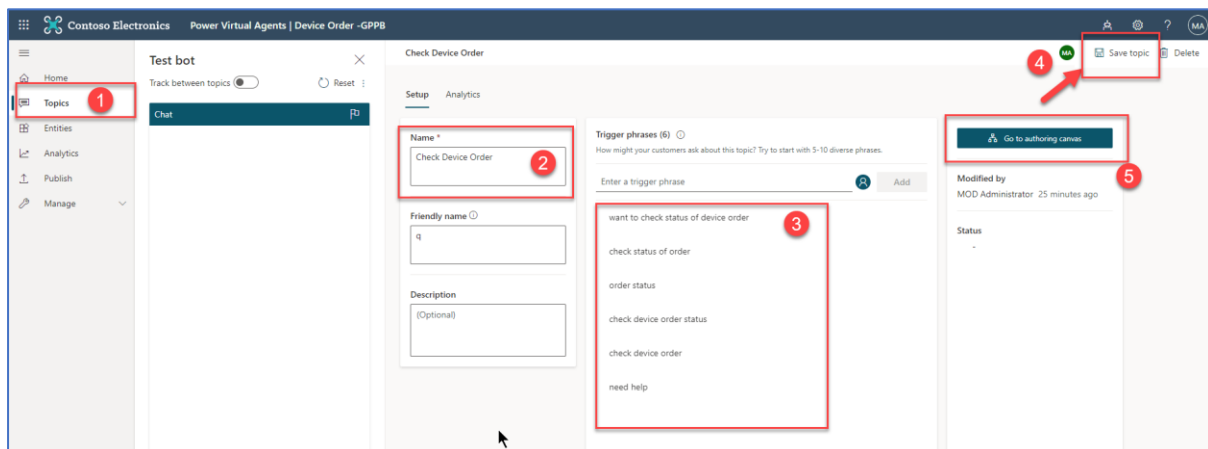
Bots

Device Order -GPPB (US) ✓
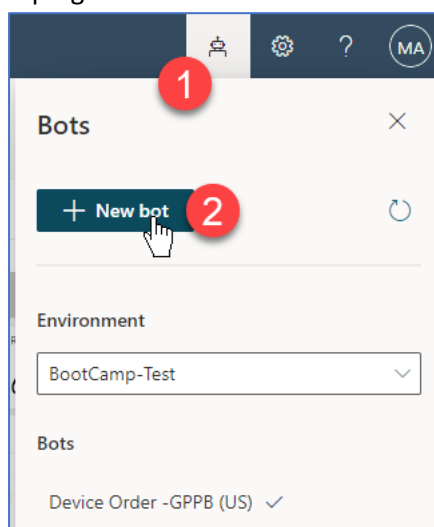
2. This will open the same pop up as step 1. Fill in the information and create a chatbot.

## Step 2: Create a new Topic for Device Order Check

Create Topic

1. From the left navigation, click on Topic and create a new topic named "Check Device Order".

2. Add following triggers under "Trigger Phases".
   a. need help
   b. check device order
   c. check device order status
   d. order status
   e. check status of order
   f. want to check status of device order
3. Click on Save topic.
4. Click on Go to Authoring Canvas (#5 from the above screen).
5. Click on + icon and Ask a question.
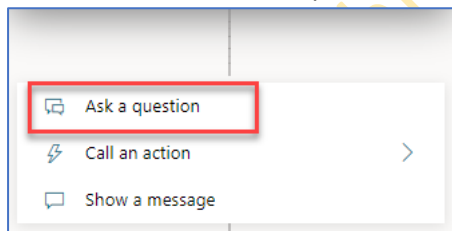
6. Question: Please Enter the Email address which you used to register your order?
   Identify: Take the user's entire response
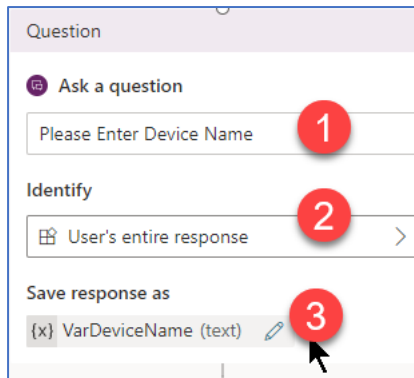   Store response is variable. Click on the variable name and rename it.
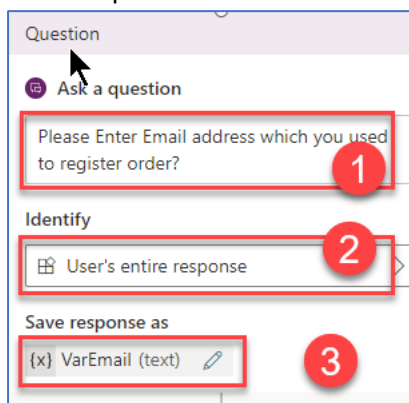
7. Similar way ask one more question to accept Device names from end-users.

Question: Please Enter Device Name
Identify: Take the user's entire response
Store response is variable. Click on the variable name and rename it.

8. Now, we will pass these values to Power Automate flow and check records from the CDS data source. If we found the record we will notify the users if the Device order is – InProgress or Approved or Rejected.

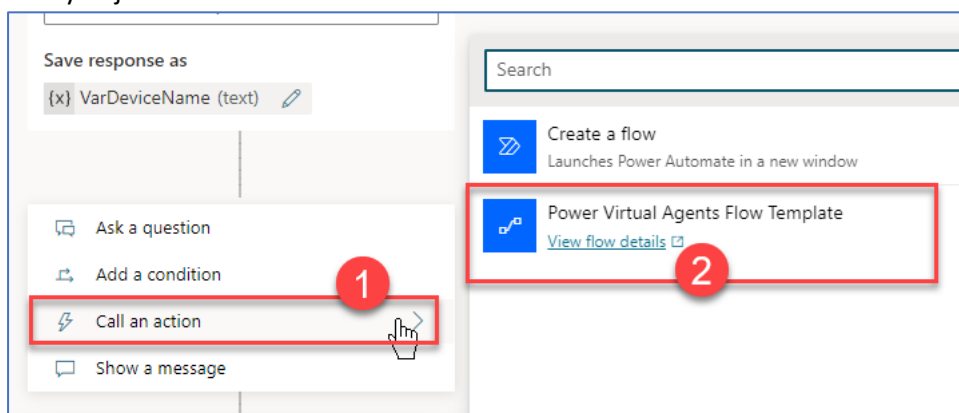9. Add a node and click on "Call an action" and select "Create a flow"
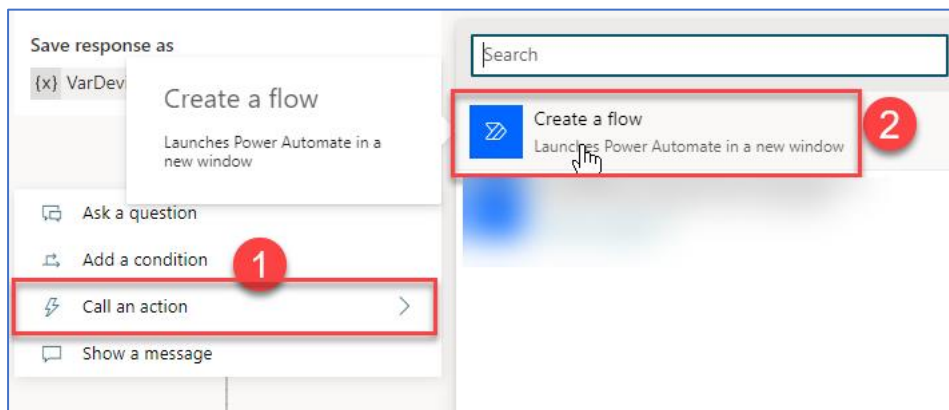
10. This will create the following OOTB template of the flow.
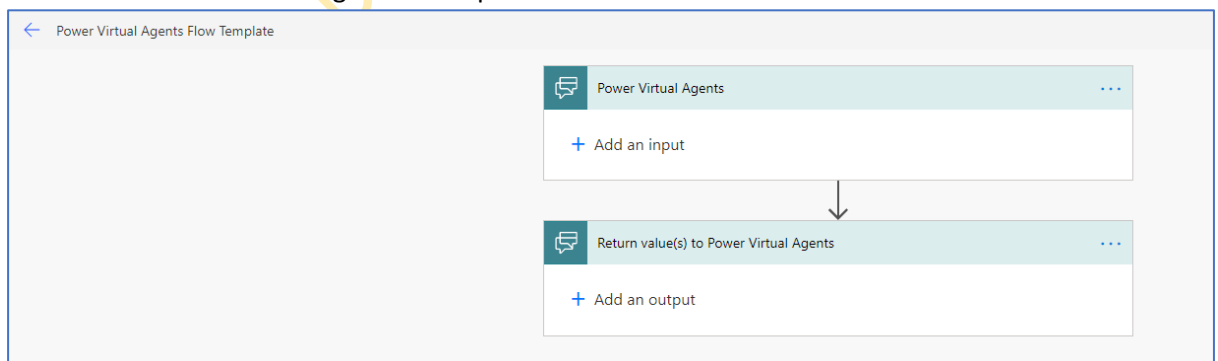
11. Now, we need to make changes in the flow and create an end flow like below. Please check the section "PVA-Flow" for creating the detailed level of flow here.
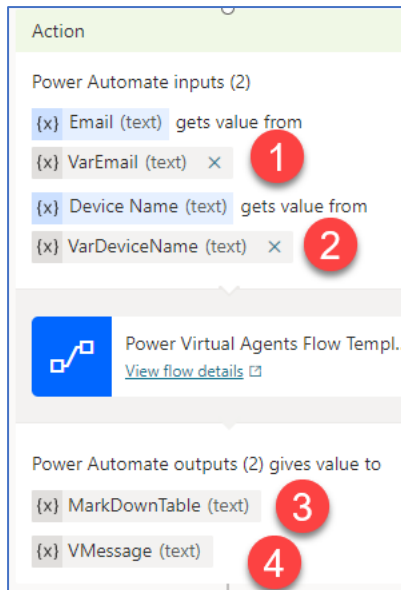
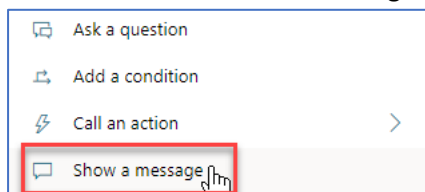12. Now, once your flow is created, the flow will appear here when you call action. Select the flow you just created.

13. We need to pass two input variables and in response, we will get two output variables.
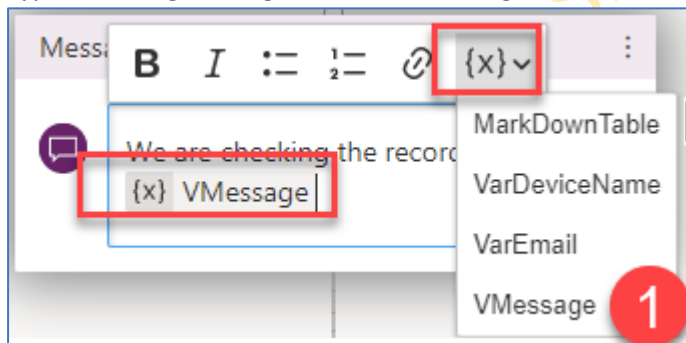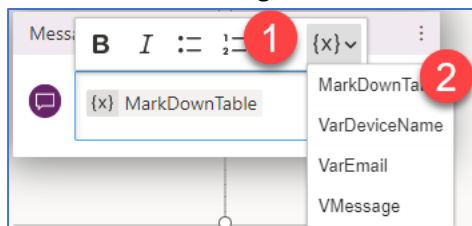
Action

Power Automate inputs (2)

{x} Email (text) gets value from

{x} VarEmail (text) ✕ **1**

{x} Device Name (text) gets value from

{x} VarDeviceName (text) ✕ **2**

⌄

Power Virtual Agents Flow Templ..
View flow details ⬈

Power Automate outputs (2) gives value to

{x} MarkDownTable (text) **3**

{x} VMessage (text) **4**

14. Add a node with "Show a message"

🗐 Ask a question

⇄ Add a condition

⚡ Call an action >

💬 Show a message

Type following message: "We are checking the records.."

Mess: **B** *I* :≡ ¹₂≡ ⌐ {x}⌄ ⋮

MarkDownTable

We are checking the record

{x} VMessage| VarDeviceName

VarEmail

VMessage **1**

15. Add one more message with the Table information.

Mess: **B** *I* :≡ ¹₂≡ **1** {x}⌄ **2**

{x} MarkDownTable MarkDownTa

VarDeviceName

VarEmail

VMessage

16. Add a node "End of conversation" and "End with survey".

🗐 Ask a question

⇄ Add a condition

⚡ Call an action >

💬 Show a message

↪ Go to another topic >

🗐 End the conversation **1** > End with survey **2**
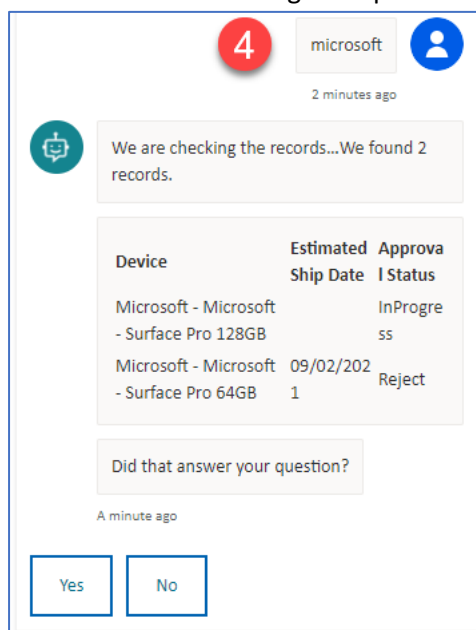
Transfer to agent
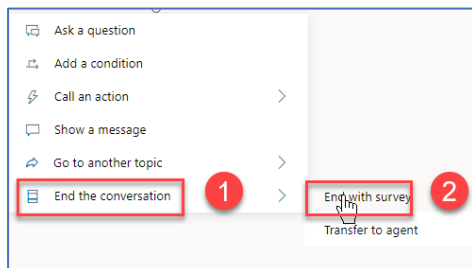
17. Save topic.

Test a Chatbot

1. Enter "Hi". This will prompt greeting message.
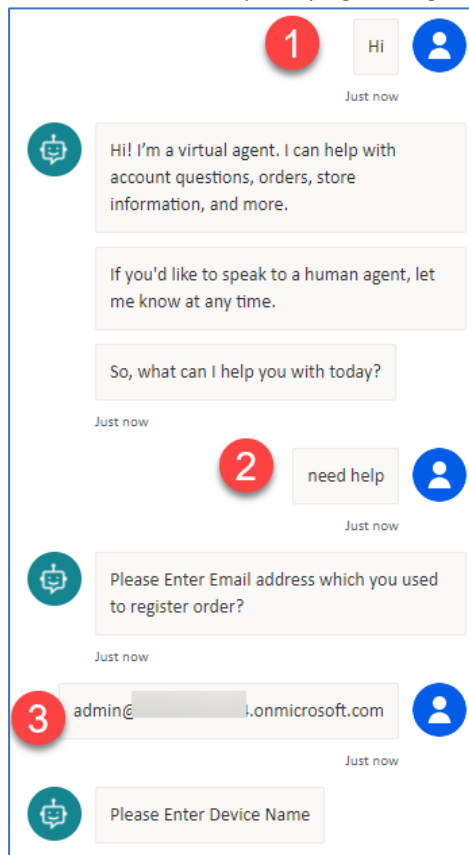
2. Then type – "need help". This will ask email address.
3. Enter Email address
4. Then it will ask device name.
5. Enter Device Name. type – "Microsoft"
6. This will return following in response.

Step 3: Create a Flow to get Device Order Status from CDS Source

Here, we will create the following flow. The same flow is available on GitHub as well.

Download flow solution: Power-Automate/Global Power Platform Bootcamp -2021 at master · Dhruvinshah16/Power-Automate · GitHub

Now, let's check the steps.

1. Add two input variables named "Email" and "Device Name".

2. Add CDS action named "List records".
    Here, Entity Name = Name of your CDS table where you want to find data.
    Filter Query = Replace yellow highlight with the variables you defined in step 1.
    cr138_requestedby eq '@{triggerBody()['text']}' and contains(cr138_devicename,
    '@{triggerBody()['text_1']}')

3. Initialize following variables:

Variable Name	Type	Value
vMessage	String	0
vDeviceName	String	
vDeliveryDate	String	
vStatus	String	
vMarkdownTable	String	| Device | Estimated Ship Date | Approval Status | |:--------|:----------------------|:-------------------|

4. Add action > Set Variable.
   Add value> We found `@{length(outputs('List_records')?['body/value'])}` records.
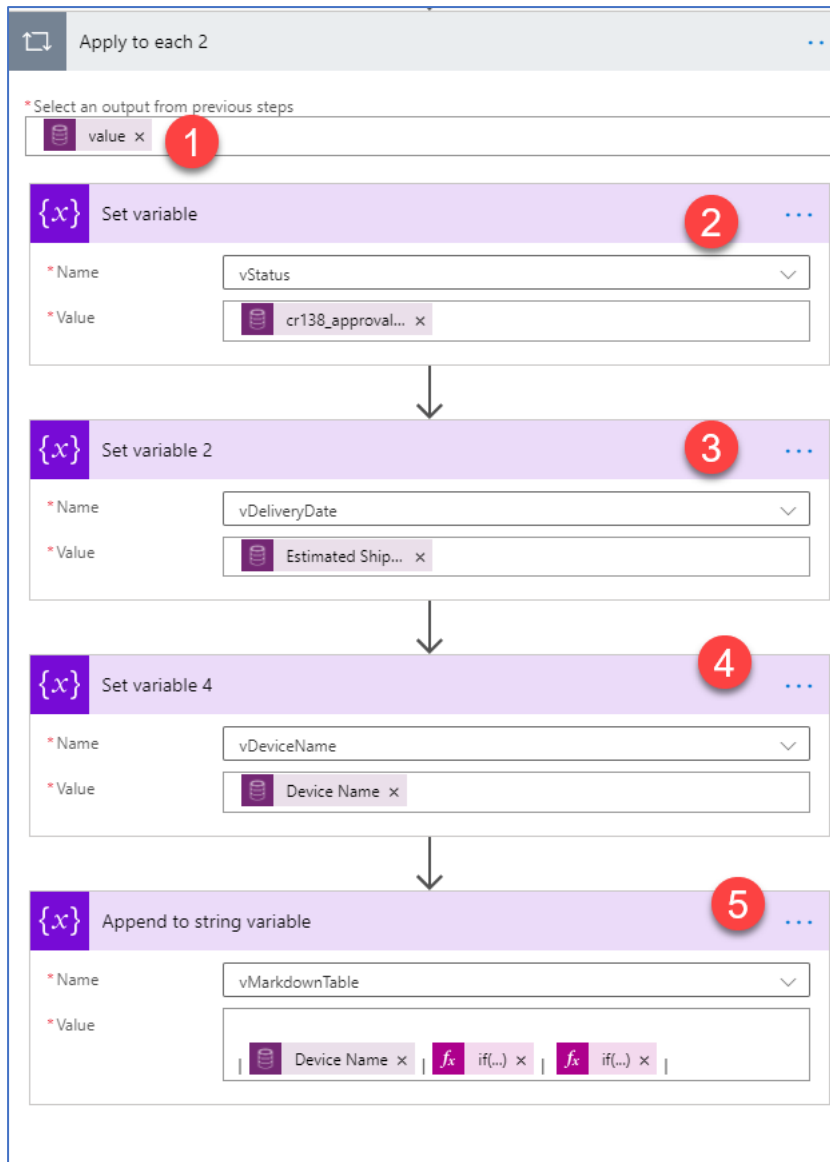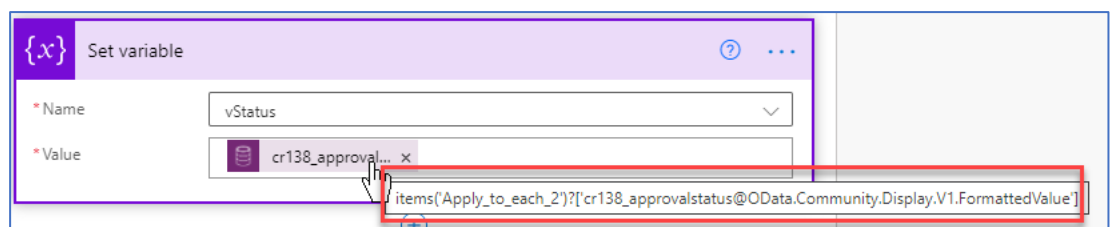   Formula: `length(outputs('List_records')?['body/value'])`
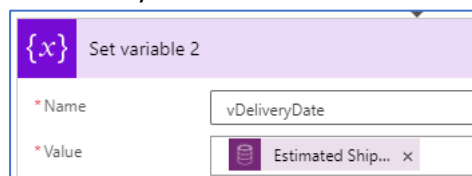

5. Add action Apply to each.
   Set "Value" in "Select an output from previous steps" section.

i. Add Action set variable and set Status Value.
   Set value as
   `items()?['cr138_approvalstatus@OData.Community.Display.V1.Formatt edValue']`

ii. Set DeliveryDate variable as Estimated Ship Date

iii. Set Device Name

iv. Add an action > Append to String:
Name = vMarkdownTable
Value:

| @{items('Apply_to_each_2')?['cr138_devicename']} |
@{if(equals(variables('vDeliveryDate'),''),'',formatDateTime(variables('vDeliveryDate'),'dd/MM/yyyy'))} |
@{if(equals(variables('vStatus'),''),'InProgress',variables('vStatus'))} |

Formula:


```
if(equals(variables('vDeliveryDate'),''),'',formatDateTime(variables('vDeliveryDate'),'dd/MM/yyyy'))
```



```
if(equals(variables('vStatus'),''),'InProgress',variables('vStatus'))
```
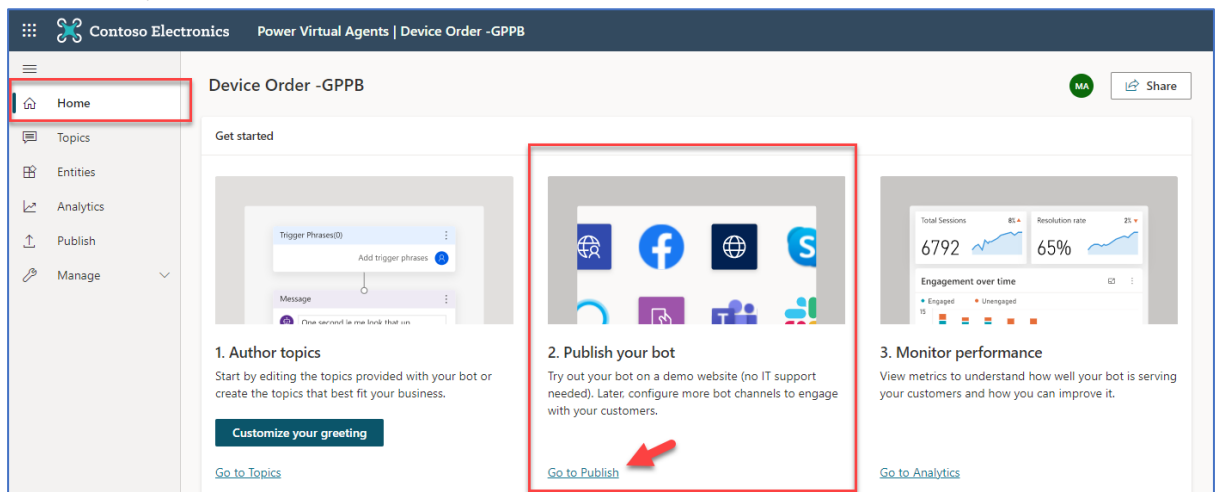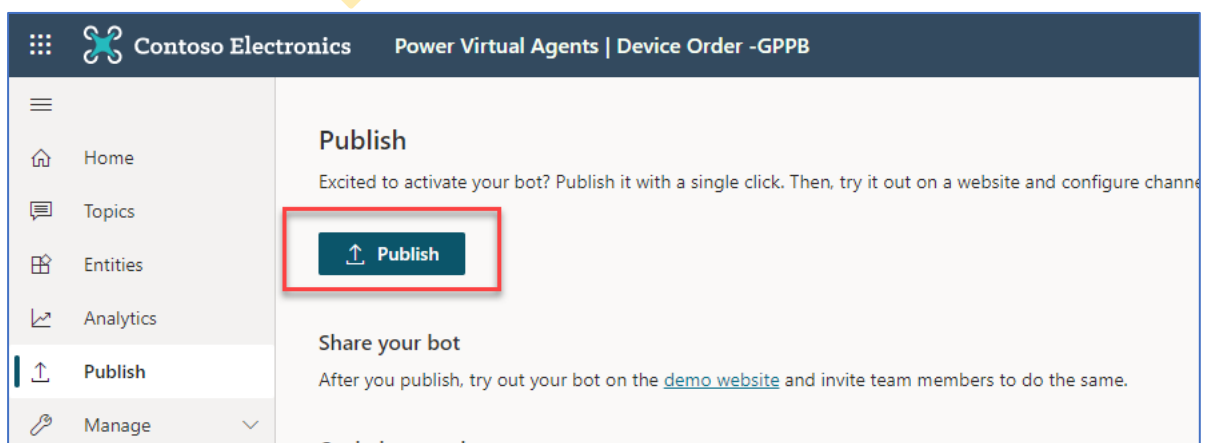
6. Return values to Power Virtual Agents.
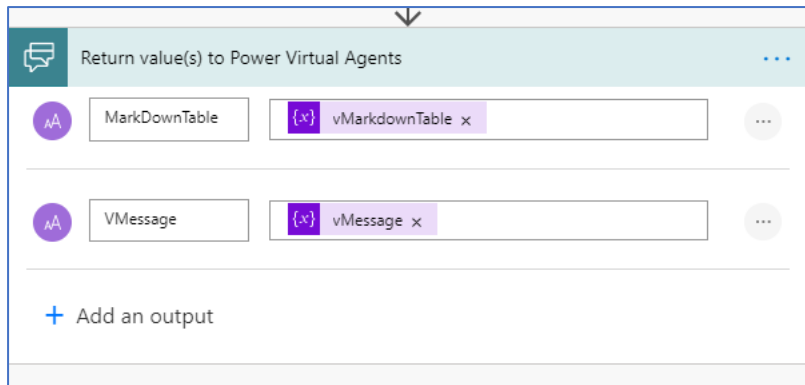
7. Save the flow.
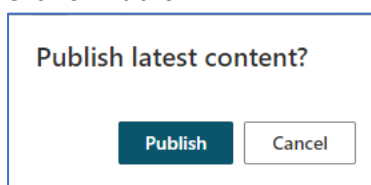
Step 4: Publish Chatbot

1. From Home, click on "Go to Publish"
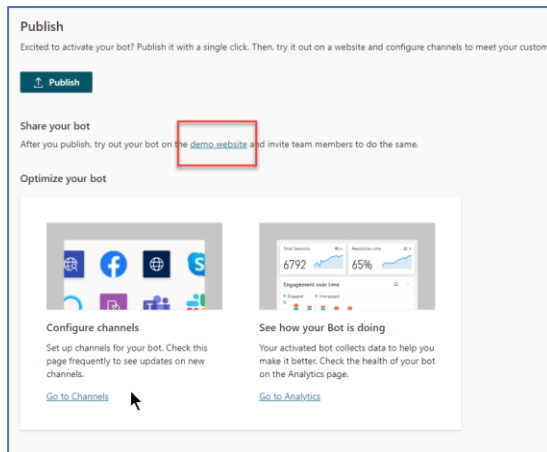

2. Click on Publish.
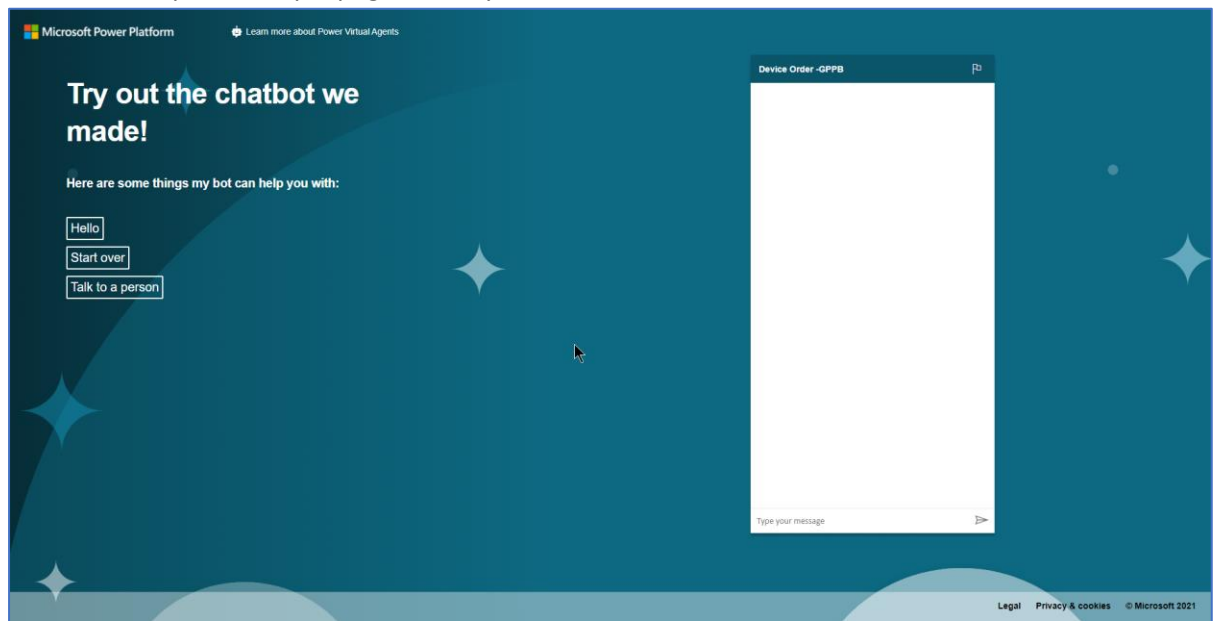

3. Click on Publish.

4. Click on demo website to test.

5. This will open a sample page where you can test the PVA Chatbot.

Conclusion:

This is how we can build our Power Virtual Agents Chatbot.

Contact Me for any Query

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Download Files: Power-Automate/Global Power Platform Bootcamp -2021 at master · Dhruvinshah16/Power-Automate · GitHub

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