# Power Platform
# App in a Day

## Overview and Pre-requisites

### Hands-on Lab Step-by-Step

# Lab Overview and Pre-requisites

## Abstract and Learning Objectives

This is a beginner level lab for you to get hands on experience with the Microsoft Power Platform technologies – Power Apps, Power Automate, Power BI, and Common Data Service. The lab includes step-by-step instructions for someone new to these technologies to build a device ordering solution within a day. Technologies covered:

**Power Apps**: A software as a service application platform that enables power users in line of business roles to easily build and deploy custom business apps. You will learn how to build Canvas and Model-driven style of apps.

**Common Data Service** (CDS): Make it easier to bring your data together and quickly create powerful apps using a compliant and scalable data service and app platform that's integrated into Power Apps.

**Power Automate:** A business service for line of business specialists and IT pros to build automated workflows intuitively.

**Power BI**: Self-service business intelligence capabilities, where end users can create reports and dashboards by themselves, without having to depend on information technology staff or database administrators.


Make sure to follow all the pre-requisite steps listed in this document before starting the labs.

Once you've completed the lab, please share your feedback using the survey at http://aka.ms/appinadayLabSurvey.

For a list of additional learning resources and introductory videos, see http://aka.ms/powerapps-resources.

## Lab structure and Learning Objectives

The lab is divided into four modules, with one lab document provided for each module.

1. **01-Power Apps Canvas App Lab Manual**:
   Focuses on the basic concepts involved in building Power Apps Canvas apps. You will learn how to:
   - Connect to data sources and filter results based on specified criteria
   - Work with screens and navigation
   - Use controls, properties, formulas and actions to customize the user experience
   - Display the logged in user's name
   - Configure app settings
   - Save and share an app
   - Run an app on a mobile device


2. **02-Common Data Service Lab Manual**:
   Introduces you to Common Data Service (CDS). You will learn how to:
   - Create and customize a custom entity
   - Use the Form control
   - Save data into Common Data Service using the Form control

3. **03-Power Apps Model-driven App Lab Manual**:

   Introduces you to building Model-driven Power Apps. You will learn how to:
   - Create a standalone Model-driven app.
   - Customize forms for the Model-driven app
   - Use a Business Process Flow to guide users through a process

4. **04-Power Automate Lab Manual**:

   Introduces you to Power Automate. You will learn how to:
   - Create a flow that is triggered when a new Common Data Service record is created
   - Automate sending approval requests
   - Customize the approval based on the CDS record
   - Use the Approval center

5. **05-Power BI:**

   Introduces you to Power BI. You will learn how to:
   - Connect Power BI to the Common Data Service
   - Transform CDS data for use in visualizations
   - Create visualizations on the CDS data
   - Combine CDS data with other data sources

# How to start a module without completing previous module(s)

The lab package includes a \**Completed** folder which consists of a set of app packages. If you wish to start on a module without having completed the previous module(s), you may import a partially built app package. See the corresponding instructions in each of the subfolders within the "Completed" folder.

- To directly start working on Module 2 -> see instructions in \Completed\Module1 subfolder
- To directly start on Module 3 -> see instructions in \Completed\Module2 subfolder
- To directly start on Module 4 -> see instructions in \Completed\Module3 subfolder
- To directly start on Module 5 -> see instructions in \Completed\Module4 subfolder

# Pre-requisites: Before starting the hands-on lab

## Task 1: Download the Lab Files – http://aka.ms/appinaday

1. **Save a local copy of the lab contents:** Download the **PAHandsOnLabContent.zip** file for the lab from **http://aka.ms/appinaday**. Save it to a local folder, such as C:\AppInADay. Extract the ZIP package. This package contains the sample data for the app, PDF copies of the lab manuals, and pre-built app packages.

## Task 2: Sign-in to Power Apps

1. **Confirm that you are licensed to use Power Apps:** Go to http://make.powerapps.com and sign-in with your business or school account. This is the same as your Office 365 or Dynamics 365 login.

2. **Start a trial of Power Apps:** Usage of the Common Data Service requires a Power Apps premium license. Go to https://powerapps.microsoft.com/pricing and select the "Start trial" option to start a free 30-day trial. For more

detailed information on signing up for a free trial, see here. For information on signing up for a free community plan for individual use, see here.

NOTE: This lab documentation assumes that you will use the web version of the Power Apps Studio, which will run in a browser: Microsoft Edge, Internet Explorer 11, Google Chrome, or Safari.

NOTE: If you are unable to sign-up for a Power Apps premium license using your organization credentials, you may provision a free Office365 demo tenant at http://aka.ms/Office365E5Trial. Use the demo tenant credentials to sign up for a Power Apps Trial

## Task 3: Install the Power Apps and Power Automate mobile applications

1. **Install the Power Apps mobile application**: Go to the app store on your mobile device. Search for "**Power Apps**" and install the Power Apps mobile application. If prompted, keep push notifications enabled.

2. **Install the Power Automate mobile application**: Go to the app store on your mobile device. Search for "Power Automate" and install the application. If prompted, keep push notifications enabled.

## Task 4: Create a new environment and CDS database instance

You must have a newly created CDS environment and database instance, that was **created just for this lab.** If you don't have a new environment or have an older environment, follow the steps below to create the environment and provision the database instance.

1. Open the Power Apps admin center by navigating to http://admin.powerapps.com in a web browser.

2. You may be prompted to sign up for a free Power Apps trial if you did not already complete this as part of a previous step. Follow the prompts to start your trial, which will give you access to the admin center.

   **Note**: you can also access the admin center by signing in at http://make.powerapps.com and clicking the settings icon in the top right and selecting **Admin center.**
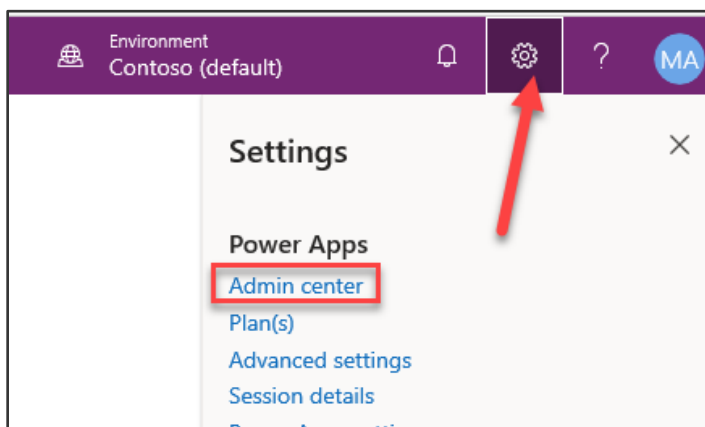


3. In the Admin center, select the Environments and click **+New**.
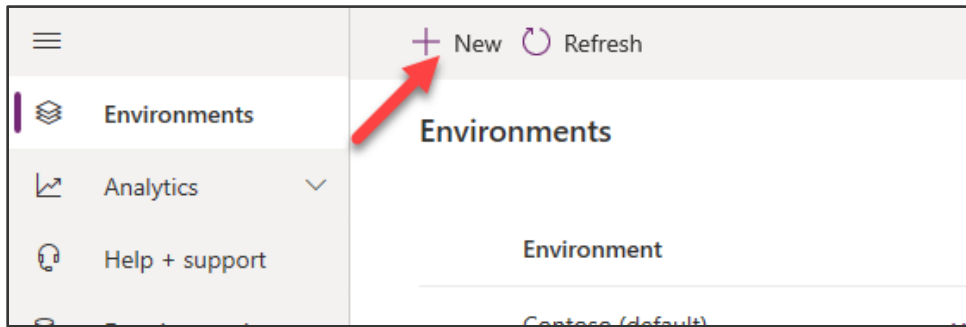
4. Provide a name for the environment. A common practice is to use your name followed by "Test" so it is clear this is a test environment.
5. Select **Trial**, select your **Region**, and set **Create a database** to **Yes**, and click **Next**.



6. Select your **Currency,** your **Language**, check **Yes** for Deploy sample apps and data, and then click **Save**.

**Note**: You can choose your local language and currency.  However, the lab manuals were created using US dollars and English language configurations.

7.  You will see a screen listing all environments that will show the newly created environment.



8.  **IMPORANT**: You need to wait for the database to finish provisioning before trying to create an application. The **Status** will change to Ready when done.



9.  This may take few minutes to complete. Wait for it to complete before proceeding with creating an app.  If it has been over two minutes, try refreshing the browser.  Once the database has been created you should no longer see this "Provisioning database" message. You can then go proceed with the lab.

# Lab survey

Once you've completed the lab, we would appreciate your feedback on: (A) the product technologies that you learned about today – Power Apps, Common Data Service, Power Automate, and on (B) the lab content – the value of the learning experience and the quality of the documentation.

Please use the survey at **http://aka.ms/appinadayLabSurvey** to share your feedback.

You may provide feedback for all modules at once, or as you complete each module. Thank you!