In this activity, you will apply the knowledge from Mini-Lesson 17.2 to create a NiFi workflow to process an Excel file and convert it to a CSV file.

Before you begin the steps of the activity below, please make sure you have a NiFi *server* running inside a Docker *container*.

Before beginning this activity, review the submission instructions below to ensure that you collect the required screenshots as you progress through the activity.

**To complete this activity, follow these steps:**

Before completing this activity, ensure that you have a Docker network, NifiNetwork, running on your machine and that a NiFi *container*, nificontainer, is connected to it and running.

1. From the Docker desktop, select the CLI for the NiFi *container.* In the *container* bash window, navigate inside the opt/nifi/nifi-current folder and create two folders: input and output. Provide a screenshot to show that you successfully created the two folders: input and output.
2. Download the [Activity17\_1.xlsx](https://classroom.emeritus.org/courses/10605/files/3007341/download) Excel file to your local machine and use a Docker copy command to copy the file from your local machine to the NiFi *server*. Provide a screenshot to show that you successfully copied the Activity17\_1.xlsx Excel file to the NiFi *server*.
3. From your web browser, navigate to http://localhost/8080/nifi. Provide a screenshot to show that you can successfully open NiFi from the browser.
4. Create a new process group and name it Activity17.1. Provide a screenshot to show that you successfully created the new Activity17.1 process group.
5. Double-click the Activity17.1 process group. Inside the process group, drag and drop a new *processor*, ConvertExcelToCSVProcessor. Provide a screenshot to show that you successfully added the ConvertExcelToCSVProcessor *processor* to the NiFi canvas.
6. Modify the *properties* for the ConvertExcelToCSVProcessor *processor* to process the Activity17\_1.xlsx file as it is explained in [Mini-Lesson 17.2](https://classroom.emeritus.org/courses/10605/pages/mini-lesson-17-dot-2-using-nifi-to-extract-data-from-an-excel-file-45-00). Provide a screenshot to show that you configured the *properties* for the ConvertExcelToCSVProcessor *processor* correctly.
7. Add a GetFile *processor*. Provide a screenshot to show that you successfully added the GetFile *processor* to the NiFi canvas.
8. Configure the SCHEDULING and PROPERTIES tabs in the GetFile *processor* to get the Excel file for processing as it is explained in [Mini-Lesson 17.2](https://classroom.emeritus.org/courses/10605/pages/mini-lesson-17-dot-2-using-nifi-to-extract-data-from-an-excel-file-45-00). Provide two screenshots. The first screenshot should show that you set the values in the PROPERTIES tab correctly. The second screenshot should show that you updated the scheduling time in the SCHEDULING tab correctly.
9. Add a PutFile *processor*. Provide a screenshot to show that you successfully added the PutFile *processo*r to the NiFi canvas.
10. Configure the SETTINGS and PROPERTIES tabs in the PutFile *processor* as explained in [Mini-Lesson 17.2](https://classroom.emeritus.org/courses/10605/pages/mini-lesson-17-dot-2-using-nifi-to-extract-data-from-an-excel-file-45-00). In the SETTINGS tab, select success to Automatically Terminate Relationships. Provide two screenshots. The first screenshot should show that you set the values in the PROPERTIES tab correctly. The second screenshot should show that you updated the scheduling time in the SETTINGS tab correctly.
11. Connect the GetFile *processor* to the ConvertExcelToCSVProcessor *processor*. Provide a screenshot to show that you successfully connected the GetFile and ConvertExcelToCSVProcessor *processors*.
12. Connect the ConvertExcelToCSVProcessor *processor* to the PutFile *processor*. Select failure, original, and success for the relationships. Provide a screenshot to show that you successfully connected the ConvertExcelToCSVProcessor and PutFile *processors*.
13. Start the GetFile *processor*. Provide two screenshots. The first screenshot should show that the GetFile *processor* is running (as indicated by a green arrow). The second screenshot should show that the input folder is empty (i.e., that the GetFile *processor* has picked up the file from the input folder for processing).
14. Start the ConvertExcelToCSVProcessor *processor*. Provide a screenshot to show that the ConvertExcelToCSVProcessor *processor* is running (as indicated by a green arrow).
15. Start the PutFile *processor*. Provide a screenshot to show that the PutFile *processor* is running (as indicated by a green arrow).
16. From the NiFi *server* bash prompt, select CLI from the Docker desktop for the NiFi *server*, navigate to the output folder, and list the files. Verify that the *processor* has created a CSV file for processing. Provide a screenshot to show that the CSV file has been created.

**Submission Instructions:**

Your submission for this activity should be a Word document that includes the following screenshots, each labeled for the step that the screenshot represents:

1. Provide a screenshot to show that you successfully created the two folders: input and output.
2. Provide a screenshot to show that you successfully copied the Activity17\_1.xlsx Excel file to the NiFi *server*.
3. Provide a screenshot to show that you can successfully open NiFi from the browser.
4. Provide a screenshot to show that you successfully created the new Activity17.1 process group.
5. Provide a screenshot to show that you successfully added the ConvertExcelToCSVProcessor *processor* to the NiFi canvas.
6. Provide a screenshot to show that you configured the *properties* for the ConvertExcelToCSVProcessor *processor* correctly.
7. Provide a screenshot to show that you successfully added the GetFile *processor* to the NiFi canvas.
8. Provide two screenshots. The first screenshot should show that you set the values in the PROPERTIES tab correctly. The second screenshot should show that you updated the scheduling time in the SCHEDULING tab correctly.
9. Provide a screenshot to show that you successfully added the PutFile *processo*r to the NiFi canvas.
10. Provide two screenshots. The first screenshot should show that you set the values in the PROPERTIES tab correctly. The second screenshot should show that you updated the scheduling time in the SETTINGS tab correctly.
11. Provide a screenshot to show that you successfully connected the GetFile and ConvertExcelToCSVProcessor *processors*.
12. Provide a screenshot to show that you successfully connected the ConvertExcelToCSVProcessor and PutFile *processors*.
13. Provide two screenshots. The first screenshot should show that the GetFile *processor* is running (as indicated by a green arrow). The second screenshot should show that the input folder is empty (i.e., that the GetFile *processor* has picked up the file from the input folder for processing).
14. Provide a screenshot to show that the ConvertExcelToCSVProcessor *processor* is running (as indicated by a green arrow).
15. Provide a screenshot to show that the PutFile *processor* is running (as indicated by a green arrow).
16. Provide a screenshot to show that the CSV file has been created.