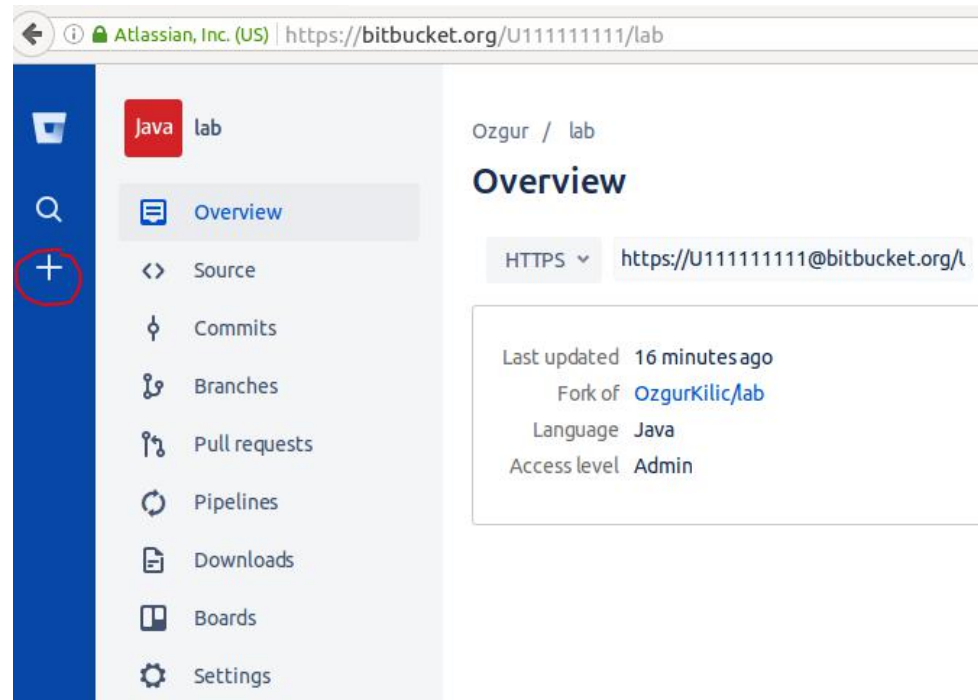


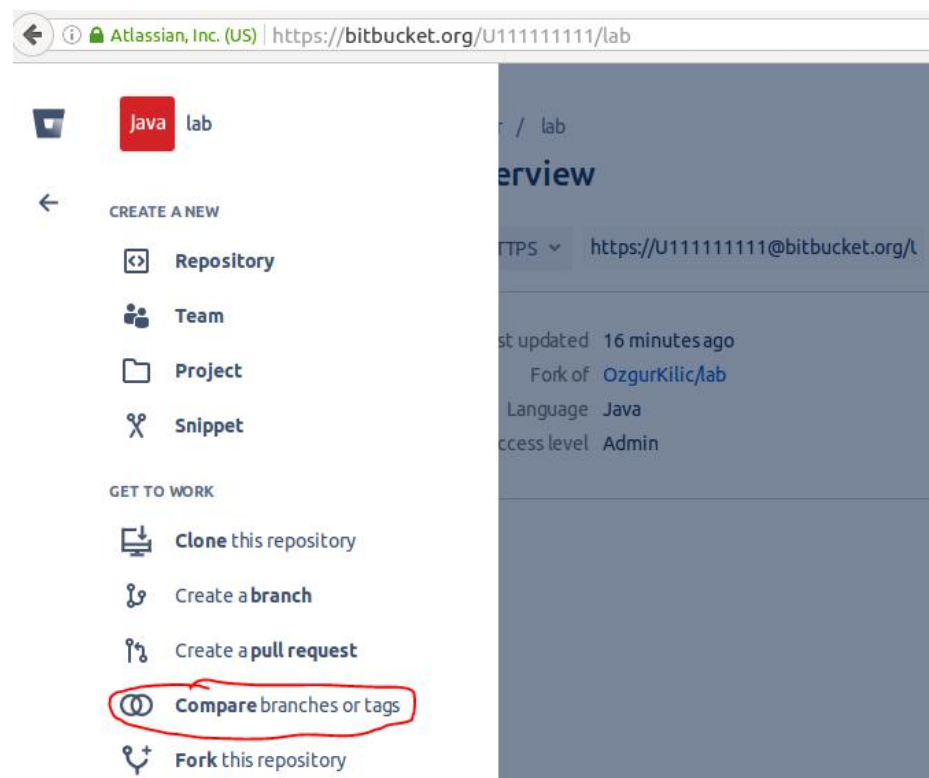
## Lab 2: Equality, Relational, and Conditional Operators

### Setup

1. Open your lab repository using bitbucket and click the “+” button.



2. Then click the “Compare” link as shown below.



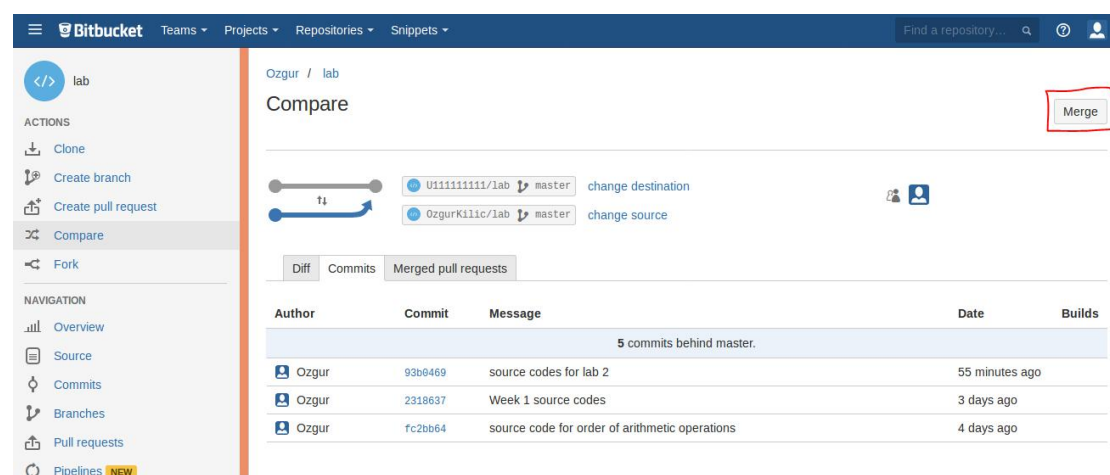
3. Click the arrows icon to swap the source and destination as shown below.



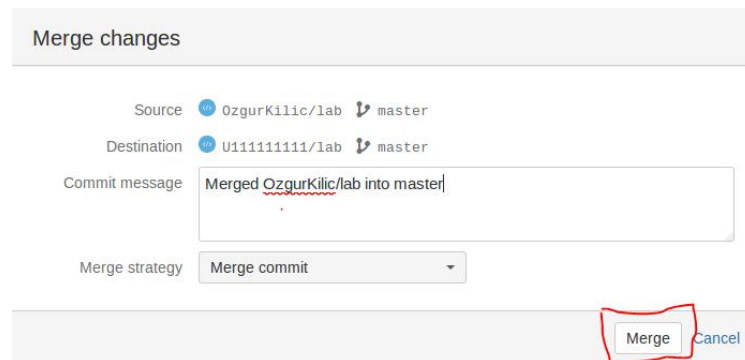
4. Then Click the “Compare” button.



5. Click the “Merge” button on the right hand side as shown below. If you don’t see the Merge button, go to step 8 and make sure you have lab2 and week1 folders in your repository source.



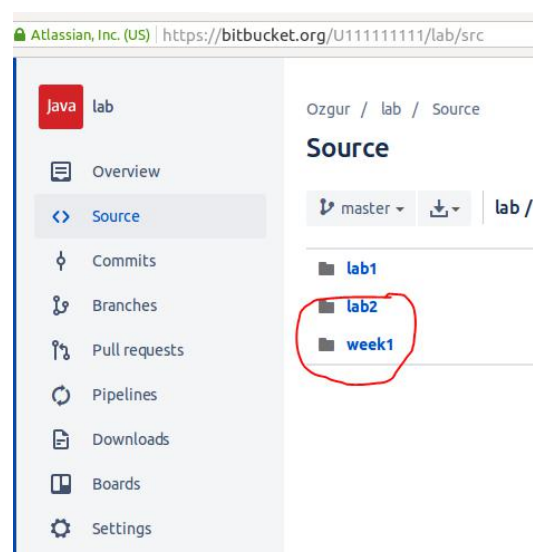
6. In the next window you should see Source as OzgurKilic/lab and Destination as UYourId/lab as shown below. Then click the “Merge” button in the dialog box.



7. Click the “Approve” button as shown below.



8. Click the “Source” button of your repository, you should see two new folders “lab2” and “week1”.



9. In command line, change directory to lab directory which was created after cloning your repository. If you haven't cloned your repository, you should clone it as described in previous lab.
10. Execute the following command in the lab directory.  
**git pull**
11. Change directory to lab2

### ***Exercise 1 : ComparisonDemo***

1. Inside the lab2 open the file ComparisonDemo.java
2. Open the file in the text Editor.
3. Read the code and try to find out what will be printed if you execute the code.
4. Save, compile and execute the ComparisonDemo and check your answer.
5. Assign 2 to variable value1 in its declaration (int value1 = 2;) and try to find out what will be printed if you execute the code.
6. Save, compile and execute the ComparisonDemo and check your answer.
7. Now assign 3 to variable value1 in its declaration (int value1 = 3;) and try to find out what will be printed if you execute the code.
8. Save, compile and execute the ComparisonDemo and check your answer.

### ***Exercise 2 : ConditionalDemo1***

1. Inside the lab2 open the file ConditionalDemo1.java
2. Open the file in the text Editor.
3. Read the code and try to find out what will be printed if you execute the code.
4. Save, compile and execute the ConditionalDemo1 and check your answer.
5. Assign 3 to variable value2 in its declaration (int value2 = 3;) and try to find out what will be printed if you execute the code.
6. Save, compile and execute the ComparisonDemo1 and check your answer.

### ***Exercise 3 : ConditionalDemo2***

1. Inside the lab2 open the file ConditionalDemo2.java
2. Open the file in the text Editor.
3. Read the code and try to find out what will be printed if you execute the code.
4. Save, compile and execute the ConditionalDemo2 and check your answer.
5. Assign the expression value1 > value2 to boolean variable someCondition in its declaration (**boolean someCondition = value1 > value2;**) and try to find out what will be printed if you execute the code.
6. Save, compile and execute the ConditionalDemo2 and check your answer.

### ***Exercise 4 : Passing Command Line Arguments***

1. Assign the following expressions to variables value1 and value2 as shown below:

- a) `int value1= Integer.parseInt(args[0]);`
- b) `int value2 = Integer.parseInt(args[1]);`
2. Save and compile ConditionalDemo2
3. Execute ConditionalDemo2 as shown below several times;
  - a) `java ConditionalDemo2 3 5`
  - b) `java ConditionalDemo2 3 -5`
  - c) `java ConditionalDemo2 5 5`

### ***Exercise 5 : Find the greatest amongst 3 numbers***

1. Create a file named GreatestDemo.java
2. Implement the main method to find the greatest number among the given 3 arguments
3. Save, compile your code and then test it with the following commands
  - a) `java GreatestDemo 3 5 2`
  - b) `java GreatestDemo 5 8 6`
  - c) `java GreatestDemo 9 7 7`

### ***Submitting code to repository***

Inside lab2 folder execute the following commands:

**git add \*.java**

**git commit -m "lab2"**

**git push -u origin master**

NOTE: Your lab will **not be graded** if

- Your account name does not have the format described in lab1.pdf
- Your repository name is not lab
- Your files have compilation errors
- You haven't complete the steps described in exercises
- Your added/modified files are not submitted to Bitbucket.
  - You have to add commit and push files as described in lab1.pdf