

What will you learn?

Creating and running a Diffusion Publisher & Subscriber:

- 1. Java
- 2. NodeJS
- 3. .NET (C#)

Sending and receiving Diffusion messages:

4. Java (Advanced)



But First!

The examples are configured to run against a **LOCAL** Diffusion server instance. If you've created a Diffusion Cloud instance or using one of the provided ones, you'll need to update the source to point to this.

You'll need to change one or more of:

- 1. Host
- 2. Port
- 3. Principal
- 4. Credentials



Java





Compiling the examples:

```
mvn dependency:copy-dependencies
mvn install
```

This will download all dependencies, compile with maven and create a .jar in the target directory.

Running the examples:

```
java -cp "target/Lab1-0.0.1-SNAPSHOT.jar:target/dependency/*" com.diffusion.training.lab1.HelloWorldPublisher
java -cp "target/Lab1-0.0.1-SNAPSHOT.jar:target/dependency/*" com.diffusion.training.lab1.HelloWorldSubscriber
```

Shortcut!

Execute publisher.sh (mac/Linux) or publisher.bat (Windows)



NodeJS



NodeJS



npm install

Running the examples:

node publish.js
node subscribe.js



.NET (C#)



.NET (C#)

Compiling and running the examples using Visual Studio:

Open the PubSub.sln file in Visual Studio (NOT Visual Studio Code).

Select either the publish or subscribe project before running.

Make sure the **Target Framework** is set appropriately (i.e. what is installed).



.NET (C#)

Compiling the examples using .NET Core:

Run dotnet build PubSub.sln from the same directory as PubSub.sln.

This will compile the projects to two separate DLLs.

Running the examples:

dotnet Publish/bin/Debug/net6.0/PubSub.dll
dotnet Publish/bin/Debug/net6.0/Subscribe.dll

You may need to change **net6.0** to the version of the framework compiled against.





