## Exercise: AWS SDK - Typescript

In this exercise you will write a Typescript program that uses the AWS SDK to copy a local file into an S3 bucket. It should be possible to run your program as follows:

> ts-node s3copy.ts <local-file-name> <s3-bucket-name>

## Assumptions

You have already configured your AWS credentials on your computer. This should have been done when you installed the AWS CLI on your computer.

Node.js and ts-node are installed on your computer.

## Steps

- 1. Create and initialize a new Node.js Typescript project
- 2. Install the AWS SDK > npm install --save aws-sdk
- 3. Create a Typescript file containing the following code:

```
// import the S3 class from the AWS SDK import { S3 } from 'aws-sdk';

// import the file system functions from the Node.js SDK import * as fs from 'fs';

// Create S3 object for doing S3 operations let s3 = new S3();

// Write code to do the following:

// 1. get name of file to be copied from the command line

// 2. get name of S3 bucket from the command line

// 3. load contents of local file into a variable

// 4. copy file contents to the specified S3 bucket using the original file name as key
```

- 4. The online documentation for the Node.js Javascript API can be found here:
- a. https://nodejs.org/api/index.html
  - b. Look for functions that let you read a file
  - 5. The online documentation for the AWS Javascript SDK can be found here:
- a. https://docs.aws.amazon.com/AWSJavaScriptSDK/latest/
  - b. Look at the documentation for the S3 class
  - 6. Test your program by using it to copy some local files into an S3 bucket in your AWS account.
  - 7. Submit your Typescript code through Canvas.

## More Information

The full AWS SDK documentation can be found here in the SDKs section: <a href="https://aws.amazon.com/tools/">https://aws.amazon.com/tools/</a>